An Outcomes Approach in the Health and Physical Education Key Learning Area

Occasional paper prepared for the Queensland School Curriculum Council

by

John Boustead

October 1999
The aim of this paper is to describe what it means to implement an outcomes approach in Queensland and to explore the challenges that confront teachers. To assist in clarifying these, specific examples in the Health and Physical Education (HPE) key learning area (KLA) will be used.

The syllabuses and support materials produced by the Queensland School Curriculum Council, demonstrate a commitment to an outcomes approach as the basis for designing school curriculum programs. Although this approach is not new and parallels overseas educational trends, there is often confusion about what an outcomes approach will mean to our planning, teaching and student learning.

Definition
The Queensland School Curriculum Council has based its outcomes approach to syllabus design on the premise that the student learning outcomes should be clearly identified for each of the key learning areas. The intended student learning outcomes were written to describe what students are expected to ‘know’ and ‘do’ (Interlink, Number 11, 1998).

Other definitions of an outcomes approach to education have included:
- ‘high quality culminating demonstrations of significant learning in context’ (Spady 1994, p.18).
- ‘a brief statement of what is to be learnt’ (Hannan & Ashenden 1996, p. 3).

Perhaps a more useful definition is provided in a summary of definitions by Brady (1996, p. 2) who described an approach that involves:
- developing clearly defined outcomes that all students must demonstrate;
- designing teaching/learning activities that assure the demonstrated performance;
- monitoring individual student progress on the basis of demonstrated performance;
- utilising criterion-referenced assessment both to monitor progress and to group students;
- providing remediation for students who do not achieve the outcomes quickly and enrichment for those who do.

The Health and Physical Education Years 1-10 Syllabus (Queensland School Curriculum Council 1999) describes three levels of outcomes. The overall learning outcomes of the curriculum contain elements common to all key learning areas and collectively describe the valued attributes of a lifelong learner. A lifelong learner is:
- a knowledgeable person with deep understanding;
- a complex thinker;
- a creative person;
- an active investigator;
- an effective communicator;
- a participant in an interdependent world;

The outcomes highlight the uniqueness of the HPE key learning area and its contribution to the Years 1-10 curriculum. They also provide a framework for the conceptual strands, the practices and dispositions developed through the key learning area, and the continuum of core learning outcomes. Through studies in the HPE KLA, students develop the knowledge, processes, skills and attitudes necessary to:
• select and use information and apply problem-solving and decision-making strategies to:
  - make informed decisions about health, physical activity and personal development;
  - evaluate their own actions and the actions of others;
• develop a strong commitment to promoting equity, acknowledging diversity and establishing supportive environments with respect to health, physical activity and personal development;
• reflect on and evaluate the influences of biological, social, cultural and environmental factors on:
  - their own and others’ health and personal development;
  - their own attitude and others’ attitudes towards, and participation in, physical activity;
• promote the health of themselves, others and their communities;
• accept their responsibility as individual members of a group or community to create and maintain environments supportive of optimum health;
• develop and refine motor skills necessary for participation in physical activity, and acquire and apply movement concepts to enhance performance;
• develop positive attitudes towards participation in regular physical activity and an appreciation of the benefits of physical activity and of the aesthetic and technical qualities of movement;
• enhance their own and others’ self-concept and self-esteem, and develop the skills for creating and maintaining positive interactions and relationships.

(The Council’s syllabus 1999, p. 7)

Core learning outcomes describe what students know and can do as a result of planned activities in the key learning area (The Council’s HPE Initial In-service Materials 1999, p. 13). They are organised in the syllabus by conceptual strands and in order of increasing complexity from Levels 1 to 6. Discretionary learning outcomes are also presented in the syllabus and describe what students know and can do beyond what is considered essential at a particular level.

Within this framework, schools are required to make decisions about what and how to teach. These decisions will be framed by the core learning outcomes but will also be informed by the needs of the students and the teaching/learning context. This is a characteristic feature of an outcomes approach as described by Willis and Kissane (1997) in that schools develop the structures and curriculums as means (not ends) to achieving the identified key things that students should understand and be able to do (the core learning outcomes).

Context
Willis and Kissane (1997, p. 6) state that for an education system to adopt an outcomes approach means that the system believes that ‘there are certain things that all students learn as a result of attending school, that it is prepared to say publicly what these things are, and that it is prepared to be held accountable in terms of them’. The Council’s syllabuses are a reflection of this assertion.

In Queensland the adoption of eight key learning areas (KLAs) as the framework for syllabus development follows the development of the national curriculum statements and profiles. Since their completion in 1993, the outcomes described in each KLA profile have been adopted and/or adapted by each State and Territory throughout Australia. A comparison of the Queensland syllabus core learning outcomes to the outcomes in the national profile shows a similarity in the conceptual underpinnings of
the KLA, the cognitive and skill demands of the levels, and the way that the learning outcomes have been framed.

**Principles and premises**

One of the key concerns of teachers within an outcomes approach could be. ‘What does it mean for me?’. One way of answering this question is to work towards a clear understanding of the principles and premises that underpin an outcomes approach.

Spady (1993) considers that there are four principles of an outcomes approach:

- **Clarity of focus** – by clearly defining the outcomes, everyone (e.g. teachers, students and parents) has a clear understanding of the learning result. Teachers are working towards a clearly defined ultimate purpose rather than planning to cover the content prescribed by a work program or textbook.

- **Expanded opportunity** – which means that students are provided with multiple opportunities to demonstrate what is expected. It also means that factors such as duration, frequency and timing can be varied to suit the needs of the learner rather than fixed time, content and contexts that characterise much of our previous educational structures.

- **High expectations** – which is based on the premises that all students can learn, success breeds success, and that schools control the conditions of success. This principle means that the ‘bell curve’ system of assessment and education is inappropriate and that criterion-referenced approaches are relevant. It does not mean that content becomes unimportant, but there is a concern for depth of understanding and high levels of competence.

- **Design down** – which means working back from the outcomes to design relevant learning experiences that will develop the relevant skills and understandings, and that will enable students to exhibit the required performances. The Council’s sourcebook guidelines and modules explain and model this process for teachers.

The Council’s initial in-service materials (1999, p. 10) reinforce these principles by describing the principles of:

- a clear focus on learning outcomes;
- high expectations for all students;
- a focus on development;
- planning curriculum with learners and outcomes in mind;
- expanded opportunities to learn.

An exercise is presented on pp.11–12 that encourages teachers to reflect on what teaching might look like within an outcomes approach.

How teachers might apply these principles is modelled in the initial in-service materials (see Modules 5, 6 and 7). By engaging with the initial in-service materials, and through the resulting professional discussions, teachers can work towards a shared understanding of the principles and premises underpinning an outcomes approach and what they mean to teaching practices.

**So what is different?**

Many teachers will recognise aspects of their current practice within the definitions, principles and premises of an outcomes approach that have been described above. For example, secondary schools have been using a criterion-referenced assessment system for some time. However, proponents of an outcomes approach argue that there are differences implicit within an outcomes approach that will challenge our traditional approaches to school-based curriculum design, implementation and
assessment. As Spady (1993, p. 1) asserts, we cannot just take our current curriculum offerings and sprinkle outcomes around or on top of them.

Based on the work of Griffin (1998) the following section outlines some of the differences between the traditional curriculum focus on subject matter and content compared to a focus on outcomes.

**Objectives, goals and outcomes**

A variety of terms has been used to frame statements of educational intent including goals, aims, objectives and, more recently, outcomes. Are they the same or are there some distinctions that help to clarify how our teaching might be different?

They all have their derivation from a desire for educational practices to be accountable — by specifying what it is we want students to learn, we can be held accountable for the students’ learning. Brady (1996) and Willis and Kissane (1997) acknowledge that the terms are often used in different ways and are even used interchangeably. However, they attempt to differentiate an outcomes approach from the typical approach in Queensland that has relied on an objectives framework.

**Goals and aims** are typically very broad descriptions of the long-term intent of the whole curriculum or learning area. Examples include the *National Goals of Schooling* (Ministerial Council on Education, Employment, Training and Youth Affairs 1999), and the global aims from the *Junior Health and Physical Education* syllabus (Board of Senior Secondary School Studies 1987). For example, the global aims from the junior syllabus state that the subject provides experiences that enable students:

- (a) to choose behaviours which promote healthy living; and
- (b) to make informed, rational decisions as to their involvement in skilful physical activities such as sports, dance and outdoor pursuits.’ (Board of Senior Secondary School Studies, 1987 p. 2).

Although the term ‘objective’ has been used in a variety of ways and with varying degrees of specificity, in Queensland we have come to understand objectives as being used to describe specific behaviours that the student should exhibit after a relatively short period of time. Indeed in secondary schools, they have been categorised as content, process, skill and affective objectives and written for each unit. They generally guide the teacher in planning learning experiences and tell what is intended to happen. An example of a content objective might be:

- Students should be able to recall the facts and terminology of health-related fitness.

This role of objectives is reinforced in the primary school HPE curriculum guide:

‘Having stated the specific lesson objective, the teacher’s function is to select teaching material, and plan how to organise and present learning experiences in such a way as to achieve the best results for each individual in the class.’ (Department of Education, Queensland 1974, p. 19):

On the other hand, outcomes tend to describe the results of learning and focus on what the student will know and be able to do. In the Council’s syllabuses, outcomes are organised into strands and describe a typical continuum of conceptual development (six levels of core learning outcomes). The period of time required to develop the understandings and skills is longer than for objectives (eighteen months to two years).

To compare these characteristics, the Level 5.3 outcome from the syllabus, *Developing concepts and skills for physical activity* strand states:
‘Students devise and implement a health-related fitness program applying principles of training.’ The statement is expressed in terms of demonstrable student behaviours, which require quite a long period of time to develop, and incorporates a range of cognitive, affective and process-oriented skills and behaviours. It is also placed within a six level sequence of conceptual understandings related to the concept of health related fitness.

The proposed differences between objectives and outcomes are summarised below:

<table>
<thead>
<tr>
<th>Objectives</th>
<th>Outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Describe the intent of teaching and serve as organisers of learning experiences.</td>
<td>• Describe what the students know and are able to do as the result of learning.</td>
</tr>
<tr>
<td>• Describe the specific behaviours (e.g. content, process, skill and affective) that the student should exhibit after a relatively short period of time (e.g. a unit).</td>
<td>• View the student demonstrations in a more holistic and integrated manner. The outcomes are described within a conceptual continuum over a long period of time.</td>
</tr>
</tbody>
</table>

**Instructional content**

Traditional content-based programs have focused on how much work the students need to cover within the timeframe (e.g. unit, semester or year). How many times have we heard teachers frustrated because an excursion or school event takes time away from the demand to cover the set content? Another common question is: ‘How many chapters of the text book do we need to cover this term?’.

The primary school HPE curriculum guide (Department of Education Queensland 1974, pp. 7–9) outlined the major content areas of the physical education program – health education, gymnastics, basic skills, athletics, swimming, dance and rhythmic activities, adaptive physical education, fitness activities, and outdoor adventure activities. Similarly, the Junior HPE syllabus (Board of Senior Secondary School Studies, 1987, p. 12) described the requirements of the subject in terms of three compulsory elements (Foundations of Physical Education, Health Education, and Games and Sports) and five elective elements (Dance, Athletics, Gymnastics, Aquatics and Outdoor pursuits). Time was specifically allocated to the Junior HPE subject:

‘The minimum amount of timetabled school time...is 150 hours through Years 9 and 10’ (Board of Senior Secondary School Studies 1987, p. 12). The view of the curriculum from these statements is of a discrete subject, requiring a fixed period of time to cover a prescribed type of content.

Because the outcomes cover a broad band of schooling and because not all students learn at the same rate, outcomes require a more flexible approach to time allocation and content selection. Students will also demonstrate the outcomes through a wide range of experiences (content and contexts), encountered over a longer period of time. This is not to suggest that content is not important. However, an outcomes approach does shift the emphasis to learning how to learn the content rather than on specific facts and skills.

The proposed differences between a content-focused structure and an outcomes approach in relation to the use of content are outlined in the table below.
Objectives/Content focused curriculum | Outcomes approach
---|---
• Involves estimating the amount of material that can be learned in a given period of time. | • Requires a more flexible approach to time allocation.
• Usually uses a narrow source of materials (textbooks or workbooks). | • Uses a variety of text, media and real-life materials based on various learning styles. Students have the opportunity to negotiate the way that their learning develops and how it is represented.

Teaching strategies
Griffin (1998) asserts that implementation of an outcomes approach requires a reappraisal of approaches to teaching and learning, assessment and curriculum delivery. One of the key changes outlined in the literature is to regard the role of the teacher as no longer the focused source of information and learning. The teacher becomes a facilitator of learning, and indeed a co-learner, since many sources of information and learning contexts are encouraged in an outcomes approach.

For teachers in Queensland, the principles of effective learning and teaching (Department of Education, Queensland 1994) have become a recognised framework for promoting high quality educational experiences for students. These principles also resonate with the principles of teaching and learning within an outcomes framework. It is therefore tempting to simply overlay the outcomes onto our current programs and teaching methods. However, while it is easy to reassure teachers that adopting an outcomes approach is simply a matter of finetuning current practices, Brady (1996) warns that it is not so simple. He sees the challenge as helping teachers understand that an outcomes approach represents a new way of thinking about schooling.

However, Griffin (1998) acknowledges that there are significant barriers to such a change. Teachers are provided with few curriculum materials emphasising the changes needed (system-level information), and resources still tend to emphasise subject content rather than the processes that would enable students to actively construct meaning of the content. School curriculum structures also tend to constrain teacher practices, e.g. timetabling, traditional subject structures, the large number of students that the teacher is responsible for, and time allocated to lessons.

It is also important to recognise that the role of the teacher is complex. The ever-increasing curriculum pressures create a crowded curriculum, and the roles that teachers are called upon to fulfil make it difficult to focus on the outcomes themselves. In dealing with the challenges of an outcomes approach, it is important to acknowledge such barriers but also to identify and engage in the enablers (e.g. the syllabus support materials).

The HPE syllabus promotes a learner-centred approach to teaching and learning (p. 6). This approach views learning as the active construction of meaning, and teaching as the act of guiding and facilitating learning. Knowledge is viewed as ever changing and built on prior experiences. The initial in-service materials (pp. 57–62) explore the strategies of active construction of meaning, metacognition, making the curriculum relevant to students, and cooperative learning as they are applied to the key learning area.
It is possibly in the area of teaching strategies that teachers will find the greatest challenges to adopting an outcomes approach. Again, the initial in-service materials (see Module 5) provide assistance for teachers in describing an inquiry-based approach. This approach highlights the role of problem solving and decision making in enhancing students’ understanding of, and ability to take action on, issues related to health, physical activity and personal development (p. 46).

The proposed differences between a content focused curriculum and an outcomes approach in relation to teaching strategies are outlined below.

<table>
<thead>
<tr>
<th>Objectives/Content focused curriculum</th>
<th>Outcomes approach</th>
</tr>
</thead>
<tbody>
<tr>
<td>• The teacher usually selects the content and teaching methods based on previous or preferred practice.</td>
<td>• The focus of teaching and learning is on what the learner needs to learn or demonstrate.</td>
</tr>
<tr>
<td>• The emphasis is on the teacher as a transmitter of specialised information, usually relying on a direct teaching style.</td>
<td>• The teacher is a facilitator of learning using a variety of instructional techniques and groups.</td>
</tr>
</tbody>
</table>

**Assessment**

As stated previously, secondary schools have been using criterion-referenced assessment techniques for some time. However, the focus for the assessment has been on how well students have achieved the objectives selected for each unit. Telling a student that they have attained a very low achievement, or indeed a very high achievement, does not convey much information in terms of what they know or are able to do.

Willis and Kissane (1997) suggest that in an outcomes approach, the accountability question is not how well did students learn what was taught (the enacted curriculum) or what was supposed to be taught (the intended curriculum); the question becomes more focused on whether students have demonstrated the outcome. Assessment practices within an outcomes approach are concerned with demonstrations of student understandings and skills.

Again, a number of terms have evolved to describe such assessment including ‘performance assessment’ and ‘authentic assessment’. Generally though, the intention of assessment practices is to measure students’ capacity to integrate and apply their learning to complex and higher order tasks (Willis & Kissane 1997). Within an outcomes approach, there is a call for students to handle real-life problems, within real-life contexts, and the production of quality products and/or performances.

One of the implications is that teachers will rely less on regular pencil and paper tests which tend to focus on recall of information, and more on complex, problem-solving tasks that require students to apply skills and knowledge within higher order cognitive tasks.

The proposed differences between a content focused structure and an outcomes approach in relation to assessment are outlined below.
Objectives/Content focused curriculum | Outcomes approach
--- | ---
• Assessment usually occurs at a specific point in time (often at the end of the unit). | • Assessment occurs over a period of time, building up a profile of what the student knows and is able to do in a variety of contexts and on more than one occasion.
• Assessment is usually focussed on how well students have achieved the objective (eg VHA, HA, SA, LA, VLA). | • Assessment focuses on more specific indicators of the outcome that describe what students know and are able to do within the context of the unit. If necessary, a global judgement of student achievement is made on an aggregation of the indicators based on a ‘most like’ decision.

**Conclusion**

Teachers will certainly recognise many of their current practices with the principles and premises of an outcomes approach. The challenge that confronts us as teachers is to break the shackles that bind us to the more traditional views of education such as teachers as information transmitters, content-based curriculum that exists simply because it has always been done that way, fixed timelines and timetables for all students, and assessment practices that rely on regurgitation of information.

Simply sprinkling the outcomes on top of our current practice will do a disservice to both students and the adoption of an outcomes approach. An outcomes approach has the potential to provide a framework for teaching and learning that will meet many of the calls for schooling to be student focused, relevant, promote deep learning and complex thinking, and to cater for students’ needs in an ever-changing society. Confronting us all is a need to review our current teaching and learning practices and to deal with the challenges that are embedded within an outcomes approach.
References:


Institutionalized education has traditionally focused on developing children’s cognitive capacity by learning knowledge in academic disciplines. This learning environment is characterized by seated learning behavior, considered appropriate and effective, and rewarded. Physical education, as a part of education, provides the unique opportunity for all children to learn about physical movement and engage in physical activity. Its purpose has evolved from teaching hygiene to supporting the development of physically active and productive members of society.

Health and Physical Education contribute to students' academic performance, play a significant role in reducing statewide health care costs, and promote wellness. The state of Washington aims to implement high-quality health and physical education instruction to:

1. Lay the foundation for healthy and well-lifestyle throughout life.
2. Support the development of healthy and productive members of society.
3. Prioritize the needs of each student using inclusive language.

In the Health Education and Physical Education K-12 Learning Standards, grade-level outcomes are found here: Topic. Kindergarten Grade 1. The HPE learning area supports students in making informed decisions about their health and wellbeing and engagement in lifelong activity. It offers substantial opportunities for interpersonal and collaborative skills, good communication, decision-making, and goal-setting.

Alison Turner is the National Executive Director of the Australian Council for Health, Physical Education, and Recreation Inc. (ACHPER). She is originally from Adelaide where she was educated and completed her tertiary studies before teaching in the Northern Territory, Queensland, and Western Australia.

Key ideas:

- **Health and Physical Education propositions:** The Australian Curriculum: Health and Physical Education has been shaped by five interrelated propositions based on a strong and diverse research base for a future-oriented curriculum:
  1. Focus on educative purposes.
  2. Health and Physical Education is the key learning area that focuses explicitly on developing movement and concepts students need to participate in physical activities with competence and confidence. The knowledge, understanding, skills and dispositions students develop through movement in Health and Physical Education encourage ongoing participation across their lifespan and in turn lead to positive health outcomes.