

# Learning objectives and professional competencies for continuing professional development and practice improvement activities

## Writing learning objectives

#### Why?

Authors of educational activities should use learning objectives to summarise what the learner will know, feel, or be able to do, as a result of engaging in the activity. By defining learning objectives rather than a list of topic content alone, the author will also be better guided in the development of the activity, delivery of the activity and assessment of the learner.

#### What types are there?

The three categories of learning objectives are:

- 1. cognitive (knowledge)
- 2. affective (attitude)
- 3. psychomotor (skills).

**Cognitive learning objectives** tend to be the more commonly used objectives in pharmacy education. Bloom's revised taxonomy classifies cognitive (thinking) skills into six levels, organised by level of complexity from the most basic to the higher order levels of thinking. Verbs associated with each taxonomy level can be used to write learning objectives.

Level of cognitive skill	Description of cognitive skill	Verbs to use
Remembering	Recalling information	define, describe, find, identify, label, list, memorise, name, recall, recognise, repeat, state
Understanding	Explaining ideas or concepts	classify, describe, discuss, explain, express, interpret, recognise, report, review, summarise
Applying	Using information in another familiar situation	apply, practice, illustrate, implement, operate, demonstrate, employ, use
Analysing	Breaking information into parts to explore understandings and relationships	appraise, analyse, calculate, categorise, criticise, compare, contrast, determine, distinguish, differentiate, examine, test, relate
Evaluating	Justifying a decision or course of action	appraise, assess, choose, compare, compute, conclude, criticise, evaluate, estimate, judge, measure, predict, revise, score, select, value
Creating	Generating new ideas, products or ways of viewing things	assemble, compile, compose, construct, create, design, devise, generate, improve, make, prepare, produce, propose, prepare, set-up

Unfortunately, pharmacy education activities are commonly limited to the lower cognitive levels because they are relatively easy to measure.

**Affective learning objectives** are concerned with the learner's interest in, attitudes toward, and appreciation of, a subject. They are generally used where trying is as important as succeeding and include statements such as:

- 'show sensitivity to...'
- · 'accept responsibility for...'
- 'be willing to...'
- 'demonstrate commitment to...'



Affective learning objectives are challenging to develop and difficult to assess given the subjectivity of measurement.

**Psychomotor learning objectives** relate to physical movement, coordination, and use of the motor-skill areas. Development of these skills requires practice and is measured in terms of speed, precision, distance, procedures, or techniques in execution.

#### How?

Learning objectives should:

- be stated in terms of learner behaviour,
- be specific and measurable,
- use an action verb that indicates the depth of understanding expected (see table above),
- be stated precisely using terms that have a uniform meaning and are consistent with other resources, and
- be realistic.

Ideally, learning objectives should be constructed in three parts:

- a measurable verb,
- the conditions (if any) under which the performance is to occur, and
- a criterion of acceptable performance (standard).

The condition tells **how** the task will be performed and a criterion tells **how well**. If the criterion or conditions are considered obvious, they may be omitted from the learning objective, although clarity may be assisted by their inclusion.

When writing learning objectives, verbs that are vague such as: understand; know; learn about; grasp; be aware of; and appreciate; are best avoided.



### Using the competency standards

It is envisaged that individual pharmacists will use the competency standards when setting their personal CPD&PI plans. This will include using the standards to reflect on the areas of practice in which they are practising and the level of competence thus required, and to identify those areas in which they should undertake education. As such, all activities accredited by PSA for continuing professional development and practice improvement are required to state the competency standards addressed by the activity.

The competency standards can also be used by activity providers in developing their courses. To do so, it is useful to understand the structure of the competency standards.

There are eight **Domains**, which group Units that are associated with a general area of responsibility for practising pharmacists. Each Domain commences with a detailed preamble.

Each **Standard** of competency describes an area of professional performance. Units are too large to be demonstrated or assessed practicably. They are therefore subdivided into small segments called **Elements** of competency, which describe in more detail, the range of roles and activities in the workplace within each Unit. The Elements aim to integrate the knowledge, skills, attitudes and other important attributes of professional performance in the workplace.

The **Elements** of competency addressed by an activity must be clearly stated with the learning objectives for all activities accredited by PSA. They indicate the activity's relevance to the professional role of the pharmacist.

They can be stated in numerical form, e.g. 6.2.5 refers to:

Domain 6: Deliver primary and preventive health care

Standard 6.2: Deliver primary health care

Element 5: Manage records for primary health care services

However neither Standards nor Elements of competency, indicate how well these roles and activities need to be performed in the workplace. **Performance Criteria** have therefore been ascribed to the Elements to specify the appropriate level of performance required of the professional in the workplace.

Evidence Guides assist with the interpretation and assessment of Standards and Elements.

Performance Criteria and Evidence Guides may be of assistance when writing learning objectives for educational activities.



# **Examples**

- The learner will be able to:
  - Identify and discuss with a patient changes to medication management that may enhance adherence to their treatment regimen
  - Recognise when a DAA may assist therapy.

Competency standard addressed: 3.1.4

- The learner will be able to:
  - Interview patients and/or carers, including those where sensitivity to cultural issues must be observed or special communication needs exist
  - Develop an accurate medication history from the patient and/or carer that includes details of current and previous medications, relevant medical and social history and test results, previous adverse drug reactions and known allergies and sensitivities

Competency standard addressed: 3.1.1

- The learner will be able to:
  - Explain clinical aspects of diabetes and the signs and symptoms commonly associated with it
  - Explain the medication used in the treatment of diabetes in terms of pharmacological actions and therapeutic uses
  - > Describe the use and limitations of commonly ordered laboratory tests and investigations that influence medication treatment in people with diabetes

Competency standard addressed: 3.1.2