

Annex L

Oxford Learning Institute
University of Oxford

Guidance on writing programme aims and intended learning outcomes

Programme aims and intended learning outcomes are formal ways of describing what teachers are trying to achieve and what you want students to learn. They help you:

- clarify, collectively, among a Faculty, Department or group of tutors your intentions, purposes and educational ethos.
- shape student expectations.
- ensure that curriculum, teaching methods and assessment are all consistent with programme aims and intended outcomes.
- communicate with outside bodies, such as the Quality Assurance Agency.¹

Statements of aims and of intended learning outcomes can be helpful at all units of instruction, including programmes, papers, modules, and even individual tutorials, lectures or labs. This document focuses on the programme level, but the same principles are applicable to other units of instruction.

Aims: What are you, as teachers, trying to achieve?

Aims are a general statement of the Faculty or Department's intention for a programme. Statements of aims typically describe, in broad terms:

- the purpose of the programme and what the institution is trying to achieve in providing it.
- the audience for whom the programme is intended.
- the kind of career or future study for which it might prepare students.

A statement of aims might be included in a prospectus or website to help students choose whether it is the right programme for them. In programme materials such as a student handbook, the statement of aims:

- helps shape students' expectations of the programme and their teachers.
- ensures everyone involved with the programme – tutors, lecturers and examiners – shares an understanding of the programme's purpose.

Here are examples of statements of aims, drawn from programme specifications at Oxford:

¹ For each subject, the Quality Assurance Agency has coordinated the development of a UK-wide set of programme expectations, which is contained in the Quality Assurance Agency' subject benchmark statements.¹ The QAA subject benchmark statements are intended to provide a resource to support institutions in developing their own programmes, whilst ensuring that a common standard is met across the sector. They can be found at: <http://www.qaa.ac.uk/assuring-standards-and-quality/the-quality-code/subject-benchmark-statements>

Educational Aims of the MEng in Materials Science

- To provide a course of the highest academic quality in Materials Science in a challenging and supportive learning environment that attracts the very best students from the UK and elsewhere.
- To provide students with a broad, balanced knowledge of Materials Science, supported by the necessary background science.
- To develop transferable skills related to problem solving, communication, practical experimentation, and computing.
- To bring students to a position on graduation that allows them to choose confidently from many different careers, whether within Materials Science or not, and enables them to contribute rapidly to their chosen employment. This includes bringing them to a position to start graduate study for a research degree at a leading university either in the UK or overseas.

Educational Aims of the BA in Geography

The programme aims to provide:

- A coherent compulsory core syllabus focussed upon the ways in which relationships between people and the natural environment and patterns of spatial relationships vary across the globe and have changed through time.
- An understanding of how these relationships produce the distinctiveness of particular places, landscapes, and patterns of environmental and human attributes.
- The ability to conceptualise these relationships and their outcomes at a range of scales, from the global to the local.
- Awareness of how geographical knowledge and understanding, and therefore current beliefs about issues such as environmental change and global inequalities, are related to the means of depiction, conceptualisation and analysis employed.
- The opportunity to specialise in particular branches of physical and/or human geography to discover the relationships between geography and kindred disciplines at and near the frontiers of research, and develop the technical capacity to advance those frontiers.
- The acquisition of the skills relevant to the further advancement of professional geographical understanding, which are transferable to a wide range of life experiences and employment contexts.

Outcomes: What do we want students to be able to DO?

This question shifts the perspective from what *teachers* will do to what *students* will do. The focus is on *student learning*. Higher learning involves significant, long-lasting change in an individual's capacity or capability. Learning, then, is more than just an accumulation of additional information. Rather, it involves being able to *do* something with new knowledge or information or to *be* different as a result of the educational experience. Statements that describe what you want students to learn (i.e. be able to do) are called intended learning outcomes. They are:

- sufficiently high-level enough to endure routine updates to programme contents.
- written in terms of what the student is able to *do*.
- challenging and set high expectations.
- not comprehensive of *everything* a student may learn on a programme. Students may grow in desirable ways (such as becoming passionate about a subject or more confident), that you may not want to *demand* of all students. Students may also gain

unintended benefits, such as making friends or learning to read more quickly, but you might not wish to enshrine those potential effects in programme outcomes.

Intended learning outcomes are typically written in bullet points that:

- complete the unfinished sentence, “By the end of the programme, students will be able to...”
- are specific and can be assessed (e.g. in writing, speaking or performances).
- begin with an action verb. (e.g. describe, explain, apply, analyse, evaluate, create, design, critique, diagnose, formulate).
- clarify how students will use new knowledge by identifying precise intellectual, affective or motor skills required of students. Some skills are more challenging than others. (e.g. Being able to *summarise* a theory is easier than *critiquing* the theory or *developing* one’s own theory, for example.) The choice of wording signals the kind and complexity of the task involved.
- avoid words that do not help clarify how knowledge is to be used, such as “learn”, “know”, “understand”.

Statements of learning outcomes help in:

- providing coherence across a programme.
- guiding the design and teaching of particular papers, modules, lectures and formative activities to ensure they contribute to the overall programme outcomes.
- clarifying what students need to practice during the programme and, therefore, the teaching approaches and methods used. (e.g. Do they need to practice “interpreting complex experimental data” or “connecting theoretical ideas...to current debates and events”?)
- choosing methods of assessment that test whether the students can do what they are expected to be able to do.
- communicating to students what is expected of them so they can direct their study accordingly.
- enabling an institution to determine whether the programme is meeting its aims.

Educational development staff in the Oxford Learning Institute are happy to provide individual consultations with programme leaders who are writing or revising programme aims and learning outcomes or designing or revising programmes. See:

<https://www.learning.ox.ac.uk/contact/>

Some Examples of Intended Learning Outcomes

By the end of this programme, students will be able to:

1. Humanities Examples

- a) Exercise independence of mind and a readiness to challenge and criticize accepted opinions. (History)
- b) Think critically and in an historicized manner about the complex relationship between literary texts and their social, political, cultural and other relevant contexts. (English)
- c) Choose and describe the most enduring problems in philosophy (Philosophy).
- d) Distinguish between valid and invalid philosophical arguments (Philosophy).
- e) Conduct art historical research, interpreting art work and integrating appropriate secondary sources. (Art History)
- f) Apply feminist theory to contemporary social problems, using the work of major figures in the field. (Women's Studies)

2. Social Science examples

- a) Make a reasoned choice between rival answers to legal questions. (Law)
- b) Bring together information derived from a number of different sources, distinguish the relevant from the irrelevant, and create a coherent synthesis. (Law)
- c) Apply qualitative and quantitative research skills to the study of specific problems in development contexts. (International Development)
- d) Critically integrate insights from economics, politics and/or anthropology to the study of developing countries both at the macro and micro levels. (International Development)
- e) Connect the theoretical ideas learnt in the course to current debates and events as they appear in policy documents and the international press. (International Development)
- f) Identify precisely the underlying issues in a wide variety of academic debates, and to distinguish relevant and irrelevant considerations. (PPE)
- g) Engage in debate with others, to formulate and consider the best arguments for different views and to identify the weakest elements of the most persuasive views. (PPE)
- h) Recognise and analyse contexts in which relations of power, gender, ethnicity, racism and exclusion affect the forms taken by human communities. (Anthropology QAA benchmark statement).

3. Medical Sciences

- a) Appraise scientific information and advice for quality and impartiality. (science in public policy)
- b) Interpret scientific information for its applications to science policy in the context of uncertainty. (science in public policy)
- c) Identify the underlying physical principle in a biomedical sciences/physiology context. (physics of medicine).
- d) Explore and own their personal responses and feelings regarding topics such as stillbirth, termination, sexuality. (Obstetrics and Gynaecology)
- e) Perform a rheumatological examination of a patient's hands, with an appreciation for validated assessments of disease activity (and their use in guiding treatment).
- f) Diagnose rheumatoid arthritis, psoriatic arthritis and lupus on the basis of clinical features and interpretation of data (inflammatory response, RF, CCP and ANA antibodies).
- g) Formulate a management plan for polyarthritis, demonstrating awareness of the contra-indications and side effects of steroids and the commonly used disease-modifying agents (methotrexate and sulphasalazine).
- h) Respect the contributions of the multi-disciplinary team in the management of polyarthritis.
- i) Discuss a diagnosis and management plan with a patient with polyarthritis. (science in public policy)
- j) Develop ways to help reduce the effects of stress (in managing life and death situations as a doctor).

4. MPLS Examples

- a) Solve a range of known problems and tackle unseen and more open-ended ones. (Materials)
- b) Collate, analyse and interpret complex experimental data and infer conclusions where appropriate. (Materials)
- c) Select and apply appropriate mathematical methods for modelling and analysing engineering problems. (Engineering)
- d) Use scientific principles in the development of engineering solutions to practical problems. (Engineering)
- e) Use scientific principles in the modelling and analysis of engineering systems, processes and products. (Engineering)
- f) Select and apply appropriate computer based methods for modelling and analysing engineering problems and the ability to assess the limitations of particular cases. (Engineering)
- g) Analyse systems, processes and components requiring engineering solutions. (Engineering)
- h) Create new processes or products through the synthesis of ideas from a wide range of sources. (Engineering)
- i) Apply and adapt design methodologies in unfamiliar situations. (Engineering)