



Assessment of practical skills for GCE Sciences

A/AS Biology
AS Human Biology
A/AS Chemistry
AS Salters Chemistry
A/AS Physics
A/AS Geology
AS Science

In each of the above qualifications, practical skills are assessed by teachers using OCR-set tasks available for download from Interchange (OCR's secure website), with full mark schemes and detailed instructions.

OCR has designed the scheme, using input from practising teachers, to incorporate the **flexibility** of coursework with the **ease of marking** of a simple written test.

OCR provides convenient 'assessment packages', each made up of a Task, Mark Scheme and Instructions, and gives a choice of three tasks of each type. Thus, centres have a choice of task, they can assess students at different times and can attempt each type of task more than once. The assessment packages are accessed through **Interchange**, on demand, so are quick and easy to obtain, giving maximum flexibility for the teacher.

We believe that this **innovative approach** will enable centres to assess practical skills in a way that is educationally sound, supports good practice, engages students and takes minimal teacher resource. The tasks themselves have been planned to be easy to provide and robust when attempted by students, allowing them to demonstrate their practical skills in a non-threatening way during normal class time.

What is Interchange?

OCR Interchange is a free, secure site that has been developed to help centres carry out day to day administration functions online quickly and efficiently.

In order to use Interchange, your centre will need to be registered with OCR.

What are the advantages of this approach?

The tasks can be fitted into the normal teaching programme

- Each task is referenced against one or more of the teaching modules in the course and can be used at a time convenient to the centre, following the teaching of the content and skills needed by the task.
- The tasks make use of standard practical activities which teachers will almost certainly wish to carry out with students as part of the course.
- Tasks are short so that they can, in most cases, be carried out in a normal lesson.
- Where a task cannot be completed in a lesson (due to candidates needing additional time because of special requirements, or data collection taking longer than anticipated, or other exceptional circumstances such as fire alarms) the task can be completed in the following lesson.
- Tasks can be downloaded from **Interchange** when they are required. They will be available from early June for the following academic year, so A2 tasks can be started at the end of the AS year, if desired.

The scheme is very flexible

There are three alternatives available for each type of task and there are many ways of using these tasks, for example:

- Two or three could be used with students and the best mark of each type submitted.
- One task of each type could be used as a 'mock' (for formative assessment), the second as the assessed task with the third kept in reserve for candidates whose performance is disappointing.
- Just one task of each type could be used with students and those marks submitted.
- Students who miss assessments can be accommodated easily.
- Where tasks use equipment or resources which are unavailable at the centre, there are alternative tasks available.
- OCR will keep in mind the needs of candidates with special requirements, giving choice to centres of tasks which use a variety of skills.



Why teacher-marked and not examiner-marked?

So that the teacher has ownership

- The teacher has a choice of task and can decide when to administer them.
- The teacher is able to monitor the progress of students during the course and ensure that the marks submitted are a true reflection of their abilities.
- Teachers see the students doing the tasks and when marking them they can apply professional judgement.
- Where students' marks are disappointing, they can attempt an alternative task.

Other sciences

A2 Human Biology

A2 Salters Chemistry

A/AS Advancing Physics

In each of the above qualifications, practical skills are assessed using teacher-approved tasks assessed using generic mark schemes.

Further information

- Specifications and specimen assessment materials, including specimen practical tasks, can be found on the OCR website.
- Practical handbooks for each qualification are in preparation and will be published on the OCR website, www.ocr.org.uk, in Spring 2008.
- Live tasks will be published on the OCR **Interchange** website in June 2008.
- A full series of '**Get Started**' INSET sessions is available from Spring 2008; details are on the OCR website.

Full instructions are provided

- Each task has a set of detailed instructions, downloaded from **Interchange**, which includes information on the materials and apparatus required, the results expected and advice on setting up the experiment.
- Teachers can use their professional judgement to make appropriate variations to the materials and apparatus, to ensure that the experiment generates the expected outcomes, or to avoid unnecessary purchases.
- The tasks are not practical examinations, so while students must work individually, there is no requirement to set up individual workstations.

The tasks are straightforward to mark

- Students work on structured papers downloaded from **Interchange**. These are very similar to examination papers, so each student's answers will always follow the same format, making marking easier.
- Each task has a mark scheme written specifically for the task, and is as objective as possible.
- Each task has just 10 - 20 marking points.

Standardisation can be achieved easily

- Mark schemes are not generic or hierarchical and can therefore be applied reliably and consistently.
- Internal standardisation will simply require that a check is made that each teacher marking a task is applying the mark scheme correctly.
- In large centres, this could be achieved by arranging that each teacher marks one task for all students, or carries out a spot check across all those marking a particular task.

Quality assurance will be straightforward

- Mark schemes can be applied consistently and reliably, so adjustments to marks awarded by centres should be rare.
- OCR will look to develop a 'light touch' to quality assurance.

OCR Customer Contact Centre

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