



**National Qualifications 2014
Internal Assessment Report
Technological Studies**

The purpose of this report is to provide feedback to centres on verification in National Qualifications in this subject.

National Courses

D186 Applied Electronics

D187 Systems & Control

General comments

All centres in this year's verification sample had a clear understanding of the management and assessment of the Structured Question test (IA1) in both Units and across all levels. The assessment of Practical Activities (IA2) in the Systems & Control Unit was consistently assessed in line with national standards.

The central verification event reviewed the assessment decisions of 12 centres covering evidence from the Applied Electronics and Systems & Control Units, and across Intermediate 2, Higher, and Advanced Higher levels.

The number of Not Accepted verification decisions was two fewer than last year.

Unit	Number of centres	Number of candidates	Number Accepted	Number Not Accepted
D186 Applied Electronics	9	88	5	4
D187 Systems & Control	3	35	3	0

All of the four Not Accepted results were based on the assessment of the evidence for Practical Activities in the Applied Electronics Unit.

Course Arrangements, Unit specifications, instruments of assessment and exemplification materials

All the centres reviewed had a good understanding of the Unit specifications and instruments of assessment. It was clear that a small number of assessors were unfamiliar with the content of the *Exemplification of Standards: Technological Studies — Practical Activities* document and in particular the advice for the Applied Electronics Unit.

Evidence Requirements

Assessors are familiar with the Structured Questions (IA1) and can accurately and consistently assess this to national standards.

In the Applied Electronics Unit, assessors are advised to consult *Exemplification of Standards: Technological Studies — Practical Activities* document for details on suitable problem tasks and appropriate evidence.

Administration of assessments

The centres' administration was generally very good. The reliability of assessment was consistent and there was an increase in the number of centres that provided information on their internal quality assurance procedures.

Areas of good practice

A number of centres used a template-based approach to help candidates structure and present their evidence for Practical Activities (IA2). Where this approach was used the centres' candidates tended to produce appropriate evidence including a more detailed evaluation referenced to the specification.

A number of centres also included evidence of their internal verification which was to be commended.

Specific areas for improvement

In the Applied Electronics Unit, centres should note that the evidence for Practical Activities must include a valid problem statement, simulation printout, wiring diagram (preferably with accompanying photograph), and a valid evaluation. At Higher level, this task must allow candidates to test circuits that include an analogue sensor or an output driver and logic array with at least two different integrated circuits.

Assessors are also asked to note that it is recommended that a number of different problem statements are used with a ratio of around five tasks per 20 candidates.