

9. APPLIED SCIENCE

Performance Level: Very good

Areas Inspected:

- Full-time level 3 further education applied science courses.

CONTEXT

9.1 The College provides the applied science BTEC extended level 3 diploma and the subsidiary diploma in the Omagh, Dungannon and Enniskillen campuses. At the time of the inspection, there were 48 learners taking applied science at level 3.

The quality of leadership and management is very good.

9.2 The experienced and well-qualified co-ordinators, curriculum and departmental managers provide effective leadership. Their work is characterised by: rigorous analysis of pastoral and performance data; a focus on high quality teaching, learning and assessment; effective use of accommodation and resources; and well-planned continuous professional development for all staff.

9.3 The applied science programmes and the associated staff deployment are well-managed and organised across the three campuses. Roles and responsibilities are clearly defined and there are effective lines of communication through regular meetings and good use of video conferencing. The processes for self-evaluation and the resulting improvement planning have identified accurately the key areas for development in standards and achievements, teaching and learning and curriculum provision which are being addressed to good effect. The staff have appropriately begun to review the pre-entry guidance to the programmes on offer in order to take account of the mixed ability intake and to plan for increased enrolment. Economic engagement is very good. There are well-planned industrial and educational visits to support the teaching and learning and to ensure that the learners have a good knowledge of the world of work and the available progression routes to higher education or employment.

The quality of the provision for learning is very good.

9.4 The learners benefit from well-planned individual and group support from the lecturers in class and during tutorials. The student services staff also provide well-targeted support and advice for those learners who need additional assistance, in particular on managing their workload. In the lessons observed, the quality of the teaching and learning ranged from good to outstanding; just over one-third of them were very good or better. In the most effective practice, the lessons were characterised by: realistically high expectations; an appropriate balance of theory work and practical tasks that link well to prior learning experiences; effective questioning to develop the learners' thinking skills; regular assessment to gauge the extent of progress in the learning; and relevant links to industry and career progression pathways. It is noteworthy that the learners are provided with the opportunity to undertake an additional level 3 qualification in environmental sustainability as an enhancement. The staff have benefited from the constructive feedback from managers on the quality of their planning, teaching, learning and assessment, and there are appropriate action plans in place to further develop classroom practice and to improve the standards achieved by the learners.

Achievements and standards are very good.

9.5 The learners are well-motivated and have a positive disposition to learning; their critical thinking, research skills and ability to synthesise information from a wide range of sources are developed well through their confident engagement in learning. In the practical sessions observed, the experimental work was performed accurately and competently to a high standard. The learners are able to handle and manipulate apparatus safely, make dilutions and measurements to a high degree of precision and record and tabulate their results accurately.

9.6 Over the past three years, the average retention rate was good at 77% and the achievement rate was also good at 81%. The co-ordinators work hard to support students in order to maintain good retention rates and they keep an accurate track of the early leavers. As a result outcomes are improving. A majority of the early leavers achieve a partial qualification.

Table of Achievements

Course Type	Completion Year 2010/11			Completion Year 2011/12			Completion Year 2012/13			Three Yr Average		
	Ret (%)	Ach (%)	Succ (%)	Ret (%)	Ach (%)	Succ (%)	Ret (%)	Ach (%)	Succ (%)	Ret (%)	Ach (%)	Succ (%)
Full-time Courses at Level 3	62	75	47	73	79	58	81	81	65	72	78	56
Part-time Courses at Level 3	-	-	-	100	89	89	100	100	100	100	95	95
Overall	62	75	47	79	82	64	81	82	67	77	81	62