

An Roinn Oideachais agus Scileanna

Department of Education and Skills

**Subject Inspection of Science and Biology
REPORT**

**Roscommon Community College
Lisnamult, Roscommon Town
County Roscommon
Roll number: 72290R**

Date of inspection: 10 November 2015



**AN ROINN | DEPARTMENT OF
OIDEACHAIS | EDUCATION
AGUS SCILEANNA | AND SKILLS**

REPORT ON THE QUALITY OF LEARNING AND TEACHING IN SCIENCE AND BIOLOGY

INFORMATION ON THE INSPECTION

Dates of inspection	9 and 10 November 2015
Inspection activities undertaken <ul style="list-style-type: none">• Review of relevant documents• Discussion with principal and teachers• Interaction with students	<ul style="list-style-type: none">• Observation of teaching and learning during seven class periods• Examination of students' work• Feedback to principal, deputy principal and teachers

MAIN FINDINGS

- Consistently high-quality teaching was observed in all the lessons visited.
- Lessons were structured, well paced and student centred.
- Students demonstrated evidence of good-quality learning; the teaching approaches used challenged and engaged them in the learning process.
- The time allocation for the sciences meets or exceeds syllabus requirements.
- Participation in a wide variety of extra-curricular and co-curricular activities is facilitated.
- There is evidence that reflective practice and experience feed back into adapting and improving the detailed schemes of work that have been prepared for all subjects, levels and courses taught.

MAIN RECOMMENDATIONS

- A more comprehensive approach to the provision of developmental feedback on students' written work is recommended.
 - Planning to achieve defined improvements should take place; targets should set and the interventions to achieve these described and implemented, and progress monitored.
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INTRODUCTION

Roscommon Community College is a rapidly expanding school with a current enrolment of 316 students who come from a wide range of social and cultural backgrounds. The school operates under the auspices of Galway and Roscommon Education and Training Board. Science is a core subject in junior cycle and Agricultural Science, Biology, Chemistry, and Physics and Chemistry are offered as optional subjects in senior cycle. The curriculum of the school's Transition Year (TY) programme includes a module in the sciences. The school participates in Delivering Equality of Opportunity in Schools (DEIS), the action plan of the Department of Education and Skills for educational inclusion.

TEACHING AND LEARNING

- Consistently high-quality teaching was observed in all the lessons visited.
- Lessons were well planned and prepared, with all required resources to hand. Classroom management was consistently effective and inclusive of all students.
- Each lesson was well structured. Learning intentions were appropriately shared with students and were reviewed at the end of lessons. Continuity with prior learning was very good and teachers' presentations and explanations were clear and concise.
- Lessons were well paced and student centred. Active teaching methodologies were employed to motivate and engage students. Practical work was safely and efficiently managed.
- The teaching methodologies used were appropriate to the needs of the students being taught and the content of the lessons. Transitions between methodologies were seamless and students were occupied purposefully at all times.
- Very good interventions were observed in all lessons in relation to literacy support and development, in keeping with the school's literacy plan. It is intended to implement a numeracy plan in a similar manner in the near future.
- Students were well challenged by the teachers' use of high-quality questioning. This frequently led to discussion and debate within the classroom and contributed to the high level of interaction observed in lessons. Such interaction was further facilitated by the very good rapport apparent between teachers and students.
- Students engaged very well with the learning process in positive classroom environments. They worked hard and made significant contributions to lessons. They demonstrated evidence of good-quality learning.
- Differentiation was achieved through a high level of teacher movement; monitoring, encouraging and supporting students as necessary.
- A range of assessment modes was observed in use, in keeping with the school's assessment policy. However, a more comprehensive approach to the provision of developmental feedback on students' written work is recommended.

SUBJECT PROVISION AND WHOLE SCHOOL SUPPORT

- Whole-school support for the provision of the sciences is good. For example, the time allocation for the sciences meets or exceeds syllabus requirements.

- The schools information and communication technology (ICT) infrastructure is very good and ICT was well used in the classroom to engage students and stimulate interest in the lessons visited.
- There is one laboratory available that is well managed and best use is being made of it. A high level of attention was paid to health and safety management and chemicals are stored appropriately using a colour-coded scheme.
- The general classrooms that are necessarily used for teaching the sciences have a variety of charts and posters on display, most of which were prepared by students. It was encouraging to see the extent to which reference was made to these charts during lessons.
- Participation in a wide variety of extra-curricular and co-curricular activities is facilitated. Students' participation in these is indicative of the extent of the work of both teachers and school management and of the positive attitude to the sciences that prevails in the school.
- A thorough system of assessment of students work and of reporting to parents is in place; and a comprehensive homework policy is in operation. It is recommended that the role of the teacher is described in more detail in this policy.
- A positive approach is adopted to releasing teachers for continuing professional development and a variety of useful events have been attended by teachers.

PLANNING AND PREPARATION

- The quality of both planning and preparation, as observed, was very good. A very encouraging level of collegiality and collaboration was evident amongst the members of the science team.
 - A comprehensive science folder has been prepared by the science team. It contains detailed schemes of work for all subjects and levels taught, and schedules for delivery of all courses.
 - These schemes are written in terms of learning outcomes and take resource provision and teaching and assessment modes into account. There is evidence of reflective practice and experience feeding back into adapting the schemes on an ongoing basis.
 - The content of the TY plan and the teaching approaches used are in keeping with the ethos of the programme.
 - The quality and extent of record keeping is such that a profile of each student can be built up over time.
 - Certificate examination results have been analysed, trends have been noted and a comparison with national outcomes has been completed. It is recommended that this data, along with other available information, are used as a basis of planning for defined improvements. Targets for improvement should be set and the interventions to achieve these should be described. Ongoing implementation and monitoring can then proceed.
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The draft findings and recommendations arising out of this evaluation were discussed with the principal, deputy principal and the subject teachers at the conclusion of the evaluation. The board of management of the school was given an opportunity to comment in writing on the findings and recommendations of the report, and the response of the board will be found in the appendix of this report.

Appendix

SCHOOL RESPONSE TO THE REPORT

Submitted by the Board of Management

Area 1 Observations on the content of the inspection report

This subject inspection was welcomed by the school. We are interested in models of best practice in teaching and learning and the advice and direction given by the inspector allowed us to continue and enhance our practices. We were heartened by the inspector's comments in regard to the high quality teaching and learning that was observed and we were happy with his comments concerning our endeavours to create an holistic cross curricular approach to the subject. We strive to include reflective practices in all areas of the teaching and learning process and we are pleased that the inspector recognised this.

The school recognises the importance of the science subjects in the context of the wider world and as such strives to exceed the syllabus requirement for classes in this respect. This is backed up by a wide range of extra-curricular activities that complement and enhance the process of scientific investigation. Again we are encouraged by the inspector's recognition of this.

Area 2 Follow-up actions planned or undertaken since the completion of the inspection activity to implement the findings and recommendations of the inspection.

The inspector has recommended that we develop a more comprehensive approach to developmental feedback on the students' written work – specifically in the context of their journals. As such we will endeavour to use these journals for cognitive interaction. We will also endeavour to refine our approach to target setting so that the interventions that are set out for implementation are meticulously reported on and used as a means to developing focus and achievement within the prescribed topic area.