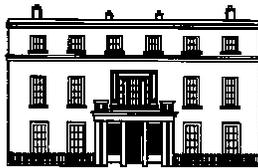


An Roinn Oideachais agus Scileanna
Department of Education and Skills

Subject Inspection of Science and Chemistry
REPORT

Saint Mary's Holy Faith Secondary School
Killester, Dublin 5
Roll number: 60791A

Date of inspection: 18 November 2015



A N R O I N N | D E P A R T M E N T O F
O I D E A C H A I S | E D U C A T I O N
A G U S S C I L E A N N A | A N D S K I L L S

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

INFORMATION ON THE INSPECTION

Dates of inspection:	17 and 18 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 five class periods• Examination of students' work• Feedback to principal and teachers

MAIN FINDINGS

- The quality of teaching and learning was very good in most lessons with some scope for development in a minority of cases.
- The intended learning objectives were set out at the start of lessons and it was good practice, in most cases, that students' progress was reviewed towards the end of the lesson.
- An *assessment-for-learning* (AfL) approach to teaching was evident across all of the lessons.
- In most cases, students' progress was clearly assessed throughout the lesson before additional or new material was introduced.
- The quality of whole-school support and provision is very good.
- Formal subject planning is complemented by a high level of ongoing collaboration and cooperation among science staff.

MAIN RECOMMENDATIONS

- All lessons should include sufficient assessment activities to ensure that learning is consolidated before proceeding to new material.
- The science department should build on the work already completed by now developing a more detailed plan for what is needed to improve the infrastructure and equipment levels in the laboratories.

INTRODUCTION

Saint Mary's Holy Faith Secondary School, Killester, is a Catholic voluntary secondary school with a current enrolment of 307 girls. The Junior Certificate, Leaving Certificate and Leaving Certificate Vocational Programme (LCVP) are provided. Transition Year (TY) is optional for students. Science is an optional subject in junior cycle.

TEACHING AND LEARNING

- The quality of teaching and learning was very good in most lessons with some scope for development in a minority of cases.
- Lessons were well managed in a respectful and cooperative atmosphere. Good classroom routines, such as a roll call and checking of homework at the start of lessons, have been established.
- The intended learning objectives were set out at the start of lessons and it was good practice, in most cases, that students' progress was reviewed towards the end of the lesson.
- Students' learning and interest was enhanced by the creation of links with Science in the everyday world and with related issues in other subject areas such as Geography and Mathematics.
- Lesson content was explained clearly and the repetition of key points throughout the lessons helped reinforce learning. Differentiation of content for higher and ordinary level students was evident in some lessons.
- Team teaching was used very effectively to support the professional development of a student teacher. The approach taken was for the teachers to individually take the lead for some sections of the lesson but also to share the lead in other sections.
- An *assessment-for-learning* (AfL) approach to teaching was evident across all of the lessons. For example, very good use was made of constructive comments in the assessment of written work. Other strategies, that involved students in thinking about their learning, included the use of 'traffic lights' to indicate the level of progress and think-pair-share groupwork. Very good use was made in most cases of open-ended questions to challenge students to think and to explore the depth of their understanding.
- In most cases, students' progress was assessed effectively throughout the lesson before additional or new material was introduced. However, in some cases, learning was insufficiently consolidated as questions required only very brief inputs from students and were directed to the whole class rather than individual students. It is recommended that all lessons should include sufficient assessment activities to ensure that learning is consolidated before proceeding to new material.
- Good attention was given in most lessons to the development of students' literacy and numeracy skills. For example, key words relating to the topic under consideration were highlighted.

SUBJECT PROVISION AND WHOLE SCHOOL SUPPORT

- The quality of whole-school support and provision is very good. Timetabling arrangements are appropriate with all classes having a double period per week.

- There is a good uptake of Junior Certificate Science. Students have a choice of three Leaving Certificate science subjects with sufficient numbers choosing Chemistry and Biology for class groups to be formed in those subjects. Students also have an opportunity to study science modules in TY.
- Regular meetings of the science department are facilitated and it is good practice that senior management sets some agenda items for discussion at such meetings.
- The school has two laboratories and associated preparation rooms. These are well maintained and stocked but would benefit from some upgrading and modernising. In line with good practice, the safety statement has identified hazards and suggested necessary improvements, which management confirmed have been implemented.
- The school is supportive of teachers' professional development. Upskilling has been provided for all staff on issues such as AfL and teaching mixed-ability groups. In addition, attendance at subject-specific training events is facilitated. The commitment of teachers to seeking out professional development opportunities in their own time was noted by management.
- Very good information and communication (ICT) facilities, such as data projectors, computers and internet access, are available in all classrooms. Tablet devices have been made available to all teachers.

PLANNING AND PREPARATION

- The science department meets regularly and keeps a good record of discussions and decisions. The duties of coordinator are shared among the team on a rotation basis.
- Formal subject planning is complemented by a high level of ongoing collaboration and cooperation among science staff.
- The subject plan is comprehensive and sets out clear schemes of work to be followed with each year group. A good assessment strategy arising from the implementation of agreed schemes of work is that year groups are given common Christmas or summer tests.
- It is good practice that the subject plan records the science department's subject-specific procedures on areas such as safety, and literacy and numeracy. Another noteworthy feature of the subject plan is the inclusion of an annual analysis and review of students' outcomes in certificate examinations.
- The science teachers' commitment to enhancing science provision evident in the hosting of an after-school science club is to be commended. Opportunities are also provided for students to participate in other extra-curricular science activities such as the Young Scientist and SciFest competitions.
- The science department has identified concerns with respect to the laboratory provision and has brought these concerns to the attention of management. It would be useful to advance this work by now setting out a more detailed plan for what is needed to improve the infrastructure and equipment levels in the laboratories. Such a plan should identify the curricular or safety rationale for the various proposals and should prioritise these in terms of what is needed most urgently and what could be done on a phased basis.

The draft findings and recommendations arising out of this evaluation were discussed with the principal and subject teachers at the conclusion of the evaluation. The board of management 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

Part A: Observations on the content of the inspection report

The Board of Management welcomes the positive report of the Subject Inspection of Science. The Board is happy that the quality of whole school support for Science education has been recognized. The Board is pleased that the quality of subject development planning is at a high level.

The Board is also happy that AFL strategies are now embedded in practice and were evident in all the lessons observed. The Board very much welcomes the positive findings with regard to classroom management. The school has placed a strong focus on literacy and numeracy and is very happy that this was reflected in the lessons observed.

The Board has invested significantly in ICT facilities and is happy that this has been recognised. The Board continues to encourage extra and co-curricular activities in the area of Science.

The Board is pleased to note the positive comments with regard to its support and provision for teachers' professional development.

Part B: Follow-up actions planned or undertaken since the completion of the inspection activity to implement the findings and recommendations of the inspection

To build on the school's work in relation to Assessment for Learning, a subject planning meeting, focusing exclusively on student assessment strategies, has been scheduled.

Since the inspection, a second laboratory has been painted and a new teacher's work desk has been especially made for the laboratory at Room 2.

The Board welcomes a plan from the Science Department with regard to identified infrastructural needs and will work towards addressing these needs on the basis of priority.