Alexandra House 33 Kingsway London WC2B 6SE

T 08456 404040 F 020 7421 6855 enquiries@ofsted.gov.uk www.ofsted.gov.uk



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Mrs S Chesterton Headteacher Trentham High School Allerton Road Trentham Stoke-on-Trent ST4 8PO

Dear Mrs Chesterton

Ofsted survey inspection programme – Design and Technology

Thank you for your hospitality and co-operation, and that of your staff and students, during my visit on 30-31 March 2009 to look at work in Design and Technology (D&T).

The visit provided valuable information which will contribute to our national evaluation and reporting. Published reports are likely to list the names of the contributing institutions, but individual institutions will not be identified in the main text. All feedback letters will be published on the Ofsted website at the end of each half-term. The evidence used to inform the judgements made included interviews with staff and learners, scrutiny of relevant documentation, analysis of students' work and observation of lessons.

The overall effectiveness of D&T was judged to be satisfactory.

Achievement and standards

Achievement and standards are satisfactory.

- Students enter the school having reached standards broadly in line with average. In Key Stage 3 students learn to follow plans and instructions and use tools and equipment with some accuracy. They recall criteria when making pizzas and analyse data and information in simple ways to support their explanations when evaluating products. However they have too few opportunities to apply what they learn in new contexts, to modify their plans, and to make design decisions. Higher attaining students are insufficiently challenged.
- By the end of Key Stage 4 students are developing confidence in planning menus independently, and in using computer aided design and manufacture (CAD/CAM). They are beginning to use the work of designers and visually interesting products to influence their own ideas and learn how to use standard engineering drawing conventions.
- Trends in students' attainment and achievement in GCSE D&T examinations are variable and inconsistent, particularly in food technology.

- Systematic application of strategies to raise boys' attainment led to higher performance in GCSE product design in 2008. Students with learning difficulties and/or disabilities achieve well at Key Stage 4.
- Students' personal development is satisfactory. They enjoy D&T and this is
 well demonstrated in the large numbers who chose to continue to study
 D&T in Years 10 and 11. Most students behave well in lessons, work
 together in teams and have sensible attitudes to health and safety.
 Students say they feel confident in being able to cook healthy meals but
 also that they tend to make a lot of cakes and sweet things at school.

Quality of teaching and learning of D&T

The quality of teaching and learning is satisfactory overall.

- Teachers' subject knowledge is good; their knowledge of materials and properties are used effectively and safely in lessons. Teachers develop resources and use them well within lessons; for example, step-by-step guides support students when making and writing frames help them to give their views when evaluating their work.
- In the best lessons teachers use a range of teaching strategies well to
 engage students at the beginning of lessons, to prompt their recall of facts
 and to teach evaluation technique. Students are interested and for the
 most part are involved in lessons, but some do not speak up when they
 are unsure. Some lessons are pitched too low and do not sufficiently
 extend students learning or progress.
- Assessment, guidance and support meet the needs of students at Key Stage 4. Older students find one-to-one assessment and feedback useful: they say it acts as a catalyst to the development of their ideas. Students enjoy and are confident in reviewing each others work and undertake the role responsibly. Key Stage 3 students say they know what step to take next with their work and take notice of the comments teachers say.

Quality of the D&T curriculum

The quality of the curriculum is satisfactory.

- Courses at Key Stage 4 meet students' interests. They say they are better
 than they thought because they have more opportunity to exercise
 independence by making decisions about what they do. The emphasis on
 practical demonstration and learning by doing meets the needs of
 students undertaking the new engineering course.
- Students consider D&T is relevant in meeting their general interests and career aspirations. Key Stage 3 students also see its relevance in developing teamwork and life skills. Students have too few opportunities to work with computer aided design and manufacture, particularly at Key Stage 3.
- The school is at early stages in reviewing the Key Stage 3 curriculum and deciding how to modify it. The current course lacks balance, with too many focussed tasks in which students follow teachers' instructions and

too few opportunities to apply what they learn in design and make tasks. Students enjoy the newly developed projects which offer more opportunities for them to use their own ideas and to make design decisions.

Leadership and management of D&T

Leadership and management of the subject are satisfactory.

- Senior leaders' support for D&T is well demonstrated in the training, guidance and support provided to the department and in their efforts to secure staffing of the subject.
- Aspects of D&T such as support for new staff are very well managed by the subject leader and he ensures health and safety practices are in place. The school knows that systems for monitoring and evaluating the impact of the Key Stage 3 curriculum on students' work are under developed. Self-evaluation accurately identifies general strengths and areas for development but it is unclear how the latter will be followed up.

The extent to which inequality and stereotyping are tackled in D&T

No inequality or stereotyping was noted during this visit.

Areas for improvement, which we discussed, included:

- increase students' access to and use of CAD/CAM, particularly at Key Stage 3
- ensure teaching and learning is tailored to challenge all students and meet their needs
- monitor and evaluate the impact of the Key Stage 3 curriculum on students' learning.

I hope these observations are useful as you continue to develop D&T in the school.

As explained in the previous letter, a copy of this letter will be sent to your local authority and will be published on Ofsted's website. It will also be available to the team for your next institutional inspection.

Yours sincerely

Gina White Her Majesty's Inspector Subject Adviser for Design and Technology