

Aviation House
125 Kingsway
London
WC2B 6SE

T 0300 123 1231
F 020 7421 6855
enquiries@ofsted.gov.uk
www.ofsted.gov.uk



20 February 2013

Mrs S Randle
Headteacher
Whitehouse Primary School
Dunelm Road
Elm Tree Farm
Stockton-on-Tees
TS19 0TS

Dear Mrs Randle

Ofsted 2012–13 subject survey inspection programme: science

Thank you for your hospitality and cooperation, and that of your staff and pupils, during my visit on 12 February 2013 to look at work in science.

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 without their consent.

The evidence used to inform the judgements included: interviews with staff and pupils; scrutiny of relevant documentation; analysis of pupils' work; and observation of four lessons.

The overall effectiveness of science is good.

Achievement in science

Achievement in science is good.

- Pupils achieve well from their starting points as a result of good teaching and an engaging curriculum.
- The proportion of disabled pupils and those with special educational needs is high; many of these pupils have physical and medical disabilities. They make good progress because they are well supported in lessons and learning activities are matched carefully to their needs.
- In lessons pupils willingly and productively engage in collaborative work. For example, following independent research, Year 6 pupils demonstrated a good understanding of the health risks associated with smoking when using film making software to compile reports for the school website.
- Pupils have frequent hands-on opportunities to explore in science and enjoy making predictions and observations. In a Year 2 class, pupils first

predicted what might happen in a series of experiments before enthusiastically investigating and describing what actually happened!

- Pupils know the level of attainment they are working towards and make effective use of 'pupil friendly' statements for each topic to identify what they have achieved and the next steps in their learning.

Quality of teaching in science

The quality of teaching in science is good.

- Teachers have a good knowledge of the subject and use this effectively to plan interesting and engaging lessons which build successfully on pupils' prior learning. In a Year 4 lesson, pupils worked well independently to investigate the effect of adding electrical components to a circuit. During discussion, they used their prior knowledge to suggest reasons why birds can sit on overhead wires carrying electricity without being electrocuted!
- Discussion with pupils, observation of teaching and work in pupils' books shows pupils of all abilities are suitably challenged. Additional adults usually support pupils' learning effectively but, on occasion during interactions with pupils, they miss opportunities to correct pupils' understanding or develop their knowledge further.
- Regular professional development, led by the experienced subject leader, ensures science has a high profile in school and that staff are confident teachers of scientific knowledge, understanding and skills.
- Marking usually highlights where pupils have shown a good level of understanding or where misconceptions are evident. However, teachers do not always identify how work could be improved or provide prompts to extend pupils' thinking.
- Homework, to broaden pupils' science knowledge or deepen their understanding, is under used.

Quality of the curriculum in science

The quality of the curriculum in science is good.

- The curriculum is broad and balanced with strong focus on developing pupils' scientific enquiry skills. Work in books over time and photographic evidence shows pupils have a diverse learning experience in science that enables them to learn well and make good progress.
- Collaborative planning between staff teaching in the same year group and the regular sharing of good practice ensure that the curriculum is delivered in a creative and inspirational way. Links between different subjects provide interesting contexts for pupils' learning in science and additional opportunities for them to develop their literacy, numeracy and information and communication technology skills.
- Good use is made of the outdoor learning environment and local resources including a wood. For example, children in the Early Years Foundation

Stage are making monthly visits to the woodland enabling them to explore, observe and record changes in the environment over time.

- The curriculum is effectively enriched through themed days and science week activities alongside a broad range of visits and visitors into school. These make a good contribution to pupils' enjoyment of, and achievement in, science. The school works with a university 'ambassador' with science expertise to enhance provision in the science club. Additional enrichment activities for pupils who are identified as 'gifted scientists' stimulate their personal interest in and curiosity for, the subject well.

Effectiveness of leadership in, and management of, science

The effectiveness of leadership in, and management of, science is good.

- The subject is well led by a very experienced practitioner who was a high level of subject expertise. These strengths are reflected in the quality of pupils' science learning experiences across the school.
- Teaching quality is carefully evaluated using both formal and informal observations, scrutiny of teachers' planning and by seeking pupils' views. Findings are used effectively to inform curriculum developments, whole staff training and tailored support for individual teachers.
- Positive developments in the use of data to track pupils' progress are too recent to have impacted on attainment. The school recognises that moderation of pupils' work will help to refine teachers' assessment.
- The subject leader makes good use of her work with the regional science learning centre, the subject association and the school's local authority improvement partner to support the further development of science.

Areas for improvement, which we discussed, include:

- embedding new systems to track pupils' progress, ensuring monitoring of progress takes full account of pupils' starting points and that all assessment data are accurate
- developing the subject specific skills and knowledge of teaching assistants to further improve their contribution to pupils' learning in the classroom
- exploring how homework could make a valuable contribution to enhancing pupils' learning in science.

I hope that these observations are useful as you continue to develop science in the school.

As explained previously, a copy of this letter will be published on the Ofsted website. It may be used to inform decisions about any future inspection. A copy of this letter is also being sent to your local authority.

Yours sincerely

Katrina Gueli
Her Majesty's Inspector