## Educational reform needs to be evaluated

At a time of major educational reform in Scotland, with both the roll out of Curriculum for Excellence and reforms to teacher education that will follow from the Donaldson review, a comprehensive strategy for the evaluation of the impacts of these reforms on the long term development of Scotland's pupils, is critical to success.

The Royal Society of Edinburgh, Scotland's National Academy, has published a paper highlighting the crucial need for the systematic collection and rigorous analysis of evidence that will show what is working and what is not working, why this is the case, and how reforms can be improved.

This paper has been sent to all MSPs, ahead of Thursday's debate in Parliament on the roll out of Curriculum for Excellence. It calls for evidence to be produced in a way that is independent and publicly available for further use by other researchers.

Professor Lindsay Paterson, a member of the RSE's Education Committee and Professor of Educational Policy at Edinburgh University, commented "Proper research and evaluation are vital to understanding the effects of changes in policy. To understand how these changes are playing out in the classroom and in the experiences of our pupils, we need sound data, rigorously analysed by researchers who are independent of government. It is the only way to measure the success of reforms, and to find out where improvements are needed."

A basic requirement for the evaluation of Curriculum for Excellence is an annual survey of pupils' experiences and attainment across the curriculum, including in English, mathematics, the separate sciences, and other distinct

disciplines such as history, geography, Modern Studies and economics.

But there must also be a deeper understanding of pupils' development: a long term survey to understand how Curriculum for Excellence is contributing to their progress, such as the Growing Up in Scotland survey. And research must be carried out into whether pupils have learnt to use the applicable skills that are given such importance in the new curriculum, by the time they leave school.

Evaluation of the reforms to teacher education must allow researchers to understand how teachers' knowledge, practices and opinions contribute to or hinder pupils' learning.