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# Streaming and Setting in UK Primary Schools: evidence from the Millennium Cohort Study

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**ABSTRACT** This article provides a brief historical perspective on structured ability grouping, a summary of recent research on streaming and setting amongst seven-year-olds from the Millennium Cohort Study, and considers some of the implications of what appears to be an increase in structured ability grouping in the primary school.

## Introduction

There has been research on grouping pupils by ability for most of the twentieth century since Whipple carried out a study of the effects of special class placement on a group of high-aptitude 5th and 6th graders in the USA in 1919. Since then hundreds of studies have been undertaken and there have been many literature reviews and syntheses of research findings (for UK reviews see Hallam & Tountounji, 1996; Harlen & Malcolm, 1997; Sukhnandan & Lee, 1998; Ireson & Hallam, 1999; Hallam et al, 2002; Hallam, 2002; Kutnick et al, 2005).

Historically, streaming was the dominant form of grouping adopted in the UK. Typically, children were placed in a class based on their general ability by the age of seven and were taught in this class for all of their lessons. Children in the top stream were entered for the 11+ examination and were groomed to go on to grammar schools. The remaining children were set on a path towards the secondary modern school and low-level occupations for the rest of their lives. During the 1960s and 1970s, with the introduction of comprehensive education, the demise of the 11+, and an increasing emphasis on equal opportunities, streaming began to decline, encouraged by the Plowden report (1967) which advocated a more child-centred approach to primary education. This trend was supported by research indicating that ability grouping had no

significant effect on overall attainment and had negative personal and social consequences for pupils in the lower streams (Jackson, 1964; Barker Lunn, 1970). By the 1970s, of those schools that were large enough to stream, only about 20% chose to do so. By the 1990s this had declined further to less than 3% (Lee & Croll, 1995).

Following the Education Reform Act (1988), the 1990s saw the implementation of the National Curriculum and an emphasis on raising standards. Ability grouping in the form of setting, where children from different classes are grouped by ability for certain subjects only, was perceived as a way to raise attainment and all primary schools were encouraged to introduce it. This was reinforced by the White Paper, *Excellence in Schools*, which suggested that 'setting should be the norm in secondary schools. In some cases it is worth considering in primary schools'. The Office for Standards in Education (Ofsted) reported on ability grouping procedures, the annual reports for 1995/6 and 1996/7 both commenting on the increase in teaching based on ability groups (Ofsted, 1997, 1998), particularly in years 5 and 6 for mathematics and English. A survey undertaken by the Institute of Education, University of London in 1999 based on a random sample of 2000 schools found that within-class ability grouping was the most common grouping arrangement in the core subjects of mathematics and English, with mixed-ability groups within mixed-ability classes the most prevalent practice for all other subjects. The incidence of setting was relatively low (at most 24% in mathematics in year 6) and streaming was negligible (Hallam et al, 2003).

### **Streaming and the Children in the Millennium Cohort**

A recent research study by the Institute of Education has suggested that streaming may be experiencing a revival (Hallam & Parsons, in press). The research took advantage of the data from the Millennium Cohort Study to identify the extent to which cohort children aged 7 were in streamed or setted classes, whether specific groups of children were over-represented in particular groups and which factors best predicted group placement. A total of 5364 teachers from 3981 schools completed a questionnaire for 8875 children providing information about the children's perceived ability, attainment and behaviour and whether the child experienced streaming, setting or within-class groupings. Overall, 16.4% of the children were streamed, of whom 64.3% were also set for literacy, and 69.5% for numeracy. Stream placement was closely related to scores on cognitive ability tests. Children at schools with mixed year groups were more likely to be streamed than children educated within single-year classes as were those attending larger primary schools. Girls were over-represented in the middle streams, and boys in the bottom stream. Autumn-born children were over-represented in the top stream, and summer-born in the middle and bottom streams. Pakistani/Bangladeshi children were most likely to be at schools that streamed – 24.2% compared with 16.0% of the majority of white children – but ethnicity was not significantly related to stream placement.

Children in the bottom stream had experienced more consistent poverty, and were most likely to have mothers with fewer qualifications. Children in the top stream were the least likely to be assessed by parents and teachers as having behaviour problems on the Strengths and Difficulties questionnaire, and those in the bottom stream the most likely. Logistic regression analysis revealed that, overall, being in the top stream was best predicted by assessed cognitive ability, being born in the autumn/winter and parents owning their own home. Being in the bottom stream was best predicted by being a boy, being born in spring/summer, having a behaviour problem, being born in a lone-parent family and cognitive ability.

### **Setting and the Children in the Millennium Cohort**

The analyses relating to setting focused on literacy and mathematics (see Parsons & Hallam, submitted). Some 63% of children in Year 2 were not set for either literacy or maths, 25.8% were set for literacy and maths, and 11.2% of children were set for maths (8.2%) or literacy (3.0%). Children in 'mainstream', larger, mixed-sex, non-faith, non-fee-paying schools were significantly more likely to be set than children in small, independent, single-sex, or faith schools. Predominantly, the smaller number of children in such schools minimises the ability of a school to set children. A series of logistic regression analyses revealed a similar pattern to that for streaming, with autumn- or winter-born children more likely to be placed in the top set for literacy or maths, and boys more likely than girls to be in the bottom literacy set, although there was no significant gender difference relating to mathematics and children with behaviour difficulties were more likely to be in the bottom sets.

### **Issues Arising from the Research**

The findings from the recent research summarised above show that a significant proportion of Millennium Cohort Study children at age seven were in streamed classes, while a quarter were being placed in sets for mathematics and literacy. While the source of the data makes comparison with earlier school surveys difficult, the findings suggest that streaming and setting may be increasing in UK primary schools for children at a younger age. This is a worrying development given what we know about the long-term impact of such structured groupings on educational attainment and opportunities for children in low-ability groups.

Schools are free to make their own decisions about ability grouping structures, although periodically they come under considerable political pressure to adopt particular practices. Where head teachers have been asked to indicate the rationale for the adoption of structured groupings they respond that they are implemented to raise standards, match work to pupil needs, meet the needs of different curriculum subjects, make the best use of teacher expertise, meet the non-academic needs of pupils and address issues relating to accountability to

outside bodies. Decisions do not seem to be based on ideology but on raising attainment to meet government priorities, alongside managing practical issues in the school environment (Hallam et al, 2002, 2004).

There is little recent UK research on the impact on attainment of different ability grouping practices at primary level. Such as there is has shown that, in mathematics, when similar teaching materials and approaches are adopted for setted or mixed-ability groups, mixed-ability groupings lead to better learning outcomes for those at lower levels of expertise while not reducing the attainment of high-achieving pupils (Whitburn, 2001). This supports previous research on streaming which indicated the limitations that it placed on the attainment and aspirations of those children in the lower streams (Jackson, 1964; Barker Lunn, 1970). Some of the children in the cohort study who were in streamed classes were also setted for some subjects (see Hallam & Parsons, in press). This combination may have particularly negative effects and needs to be researched further. As there is no consistent evidence internationally that structured ability grouping raises attainment (Schofield, 2010) and the most recent UK evidence suggests that mixed-ability classes tend to perform better, it seems perverse that structured ability grouping for very young children seems to be on the increase.

Current evidence relating to raising attainment in schools stresses the centrality of the quality of teaching (Barber & Mourshed, 2008). Important in this respect are teacher expectations (Schofield, 2010). Placing children in structured ability groups impacts on teacher expectations and the way that children are taught. Teachers of high-ability groups tend to expect a great deal from their pupils and provide high-quality teaching. This is frequently not the case for children in lower, including middle, groups (Boaler, 1997; Hallam & Ireson, 2003, 2005; McManus, 2010).

Some groups of children have been shown to be consistently disadvantaged by the adoption of structured ability groupings, i.e. boys; those of lower socio-economic status; and those born in the summer and (although not in the Millennium Cohort Study) children from some minority ethnic groups. Given that there is frequently little movement between groupings once they have been established (Barker Lunn, 1970; Hallam et al, 2002; Davies et al, 2003), this means that for certain groups of children an educational and career trajectory is determined at a very early age. This raises issues relating to social cohesion. Where countries practise early educational selection, of which structured ability grouping is one example, there tend to be higher levels of social segregation. Where selection is minimised, systems seem to have greater success in promoting social cohesion (Organisation for Economic Cooperation and Development [OECD], 2001; Green et al, 2006). High levels of structured ability grouping may also reduce intergenerational mobility (Brunello & Checchi, 2006; Maurin & McNally, 2007). If social mobility is a genuine political aim, the adoption of structured ability grouping practices in primary schools at such a young age is likely to be counter-productive.

Overall, the data from the Millennium Cohort Studies suggest that there has been a return to the adoption of highly structured ability grouping for very young children in some schools. While teachers believe that this will raise attainment, this is not supported by the evidence, which suggests that overall there is no impact on average attainment and that differences between those in high- and low-ability groups is often increased. Such practices, in the long term, are also likely to contribute to a lack of social cohesion and a reduction in social mobility. If the Coalition Government is serious in its intent to address these issues it needs to take action to encourage schools to adopt practices more conducive to their attainment.

### References

- Barber, M. & Mourshed, M. (2008) *How the Best Performing School Systems Come Out on Top*. London: McKinsey.
- Barker Lunn, J.C. (1970) *Streaming in the Primary School*. Slough: National Foundation for Educational Research.
- Boaler, J. (1997) *Experiencing School Mathematics: teaching styles, sex and setting*. Buckingham: Open University Press.
- Brunello, G. & Checchi, D. (2006) *Does School Tracking Affect Equality of Opportunity? New International Evidence*. IZA Discussion Paper 2348, Institute for the Study of Labor (IZA).
- Davies, J., Hallam, S. & Ireson, J. (2003) Ability Groupings in the Primary School: issues arising from practice, *Research Papers in Education*, 18(1), 1-16.  
<http://dx.doi.org/10.1080/0267152032000048578>
- Green, A., Preston, J. & Janmaat, J.G. (2006) *Education, Equality and Social Cohesion: a comparative analysis*. Basingstoke: Palgrave Macmillan.  
<http://dx.doi.org/10.1057/9780230207455>
- Hallam, S. (2002) *Ability Grouping in Schools: a literature review*. London: Institute of Education, University of London.
- Hallam, S., Ireson, J. & Davies, J. (2002) *Effective Pupil Grouping in the Primary School: a practical guide*. London: Fulton.
- Hallam, S., Ireson, J. & Davies, J. (2004) Grouping Practices in the Primary School: what influences change?, *British Educational Research Journal*, 30(1), 117-140.  
<http://dx.doi.org/10.1080/01411920310001629992>
- Hallam, S. & Ireson, J. (2003) Secondary School Teachers' Attitudes to and Beliefs about Ability Grouping, *British Journal of Educational Psychology*, 73, 343-356.  
<http://dx.doi.org/10.1348/000709903322275876>
- Hallam, S. & Ireson, J. (2005) Secondary School Teachers' Pedagogic Practices when Teaching Mixed and Structured Ability Classes, *Research Papers in Education*, 20(1), 3-24. <http://dx.doi.org/10.1080/0267152052000341318>
- Hallam, S., Ireson, J., Lister, V., Andon Chaudhury, I. & Davies, J. (2003) Ability Grouping in the Primary School: a survey, *Educational Studies*, 29(1), 69-83.  
<http://dx.doi.org/10.1080/03055690303268>

- Hallam, S. & Parsons, S. (in press) Prevalence of Streaming in UK Primary Schools: evidence from the Millennium Cohort Study, *British Educational Research Journal*.
- Hallam, S. & Toutounji, I. (1996) *What Do We Know about the Grouping of Pupils by Ability?* London: Institute of Education, University of London.
- Harlen, W. & Malcolm, H. (1997) *Setting and Streaming: a research review*. Using Research Series 18. Edinburgh: Scottish Council for Research in Education.
- Ireson, J. & Hallam, S. (1999) Raising Standards: is ability grouping the answer?, *Oxford Review of Education*, 25(3), 343-358.  
<http://dx.doi.org/10.1080/030549899104026>
- Jackson, B. (1964) *Streaming: an education system in miniature*. London: Routledge & Kegan Paul.
- Kutnick, P., Sebba, J., Blatchford, P., Galton, M. & Thorp, J. (2005) *The Effects of Pupil Grouping: literature review*. London: Department for Education and Skills.
- Lee, J. & Croll, P. (1995) Streaming and Subject Specialism at Key Stage 2: a survey in two local authorities, *Educational Studies*, 21(2), 155-165.  
<http://dx.doi.org/10.1080/0305569950210202>
- Maurin, E. & McNally, S. (2007) Widening Access to Grammar Schools: the educational impact on Northern Ireland, *Centrepiece*, 21(1), 26-27.
- McManus, J. (2010) Social Identity and Ability Grouping in a Secondary School. Unpublished PhD thesis, Institute of Education, University of London.
- Organisation for Economic Cooperation and Development (OECD) (2001) *Knowledge and Skills for Life: first results from PISA 2000*. Paris: OECD.
- Office for Standards in Education (Ofsted) (1997) *The Annual Report of her Majesty's Chief Inspector of Schools. Standards and Quality in Education 1995/6*. London: The Stationery Office.
- Office for Standards in Education (Ofsted) (1998) *The Annual Report of her Majesty's Chief Inspector of Schools: standards and quality in education 1996/7*. London: The Stationery Office.
- Parsons, S. & Hallam, S. (submitted) Prevalence of Setting in UK Primary Schools: evidence from the Millennium Cohort Study, *Research Papers in Education*.
- Plowden Report, DES/CACE (1967) *Children and their Primary Schools*. London: HMSO.
- Schofield, J.W. (2010) International Evidence on Ability Grouping with Curriculum Differentiation and the Achievement Gap in Secondary Schools, *Teachers College Record*, 112(5), 1492-1528.
- Sukhnandan, L. & Lee, B. (1998) *Streaming, Setting and Grouping by Ability: a review of the literature*. Slough: National Foundation for Educational Research.
- Whipple, G.M. (1919) *Classes for Gifted Children*. Bloomington, IL: Public School Publishing.
- Whitburn, J. (2001) Effective Classroom Organisation in Primary Schools: mathematics, *Oxford Review of Education*, 27(3), 411-428.  
<http://dx.doi.org/10.1080/03054980125200>

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