



The Impact of Creative Partnerships on Pupil Behaviour

Final Report

**Lesley Kendall
Jo Morrison
Caroline Sharp
Tilaye Yeshanew**

July 2008

Project Code CPW

Contents

Executive Summary	i
1. Introduction	1
2. Approach	2
3. Creative Partnerships and attendance at school	3
3.1 Primary school attendance	3
3.2 Secondary school attendance	6
4. Creative Partnerships and permanent exclusions from school	7
4.1 Primary school exclusions	7
4.2 Secondary school exclusions	7
5. Summary and conclusions	8
References	9
Appendix	10
A1 The datasets used	10
A2 Numbers of Creative Partnerships schools included in the analysis	12
A3 Multilevel modelling	12

Executive Summary

Creative Partnerships is the Government's creative learning programme, designed to develop the skills of young people across England, raising their aspirations and achievements, and opening up more opportunities for their futures. Between Autumn 2002 and Summer 2004, the National Foundation for Educational Research (NFER) conducted a programme-level evaluation of Creative Partnerships (Sharp *et al.*, 2006). It focused on measuring the changes in self-confidence, self-esteem and attitudes to learning amongst young people who took part in Creative Partnerships activity. Further studies explored the relationship between attendance at Creative Partnerships schools and attainment at the end of key stages 2, 3 and 4 (Eames *et al.*, 2006 and Kendall *et al.*, 2008).

Creative Partnerships is designed to develop the skills of young people across England, raising their aspirations and achievements, and engaging young people with learning. Arts Council England was interested in examining the extent to which schools' engagement with Creative Partnerships was reflected in improvements in young people's attendance and behaviour at school. This report compares schools involved in Creative Partnerships with other similar schools to explore this hypothesis, using data for 2002/3 to 2006/7 for absence rates and 2002/3 to 2005/6 for exclusions from school.

Key findings

For primary schools, participation in Creative Partnerships was associated with a greater reduction over time in total absence rates than that in schools not engaged with Creative Partnerships.

This reduction can be summarised as follows.

- The total absence rate in schools that had been in Creative Partnerships for one year was 0.15 percentage points less than that of otherwise comparable schools not engaged with Creative Partnerships.
- After an additional year of participation in Creative Partnerships, there was a further reduction in total absence rates (relative to schools not in Creative Partnerships) of 0.23 percentage points. Added to the 0.15 percentage point reduction in the first year, this gives an overall reduction in total absence rates in Creative Partnerships schools of 0.38 percentage points.
- There were further relative improvements in Creative Partnerships schools after three, four and five years.¹

¹ Although note that the difference between the fourth and fifth years was not statistically significant. This is probably because there were relatively few schools with five years of participation in Creative Partnerships.

The analysis suggested that engagement with Creative Partnerships was associated with an educationally significant reduction in total absence rates in primary schools.

No significant associations between absence rates and participation in Creative Partnerships were found for secondary schools, or between participation in Creative Partnerships and the probability that a school would permanently exclude one or more young people in any given year.

Conclusions

Participation in Creative Partnerships was associated with a reduction in total absence rates in primary schools and this reduction increased over a period of years as Creative Partnerships became more established in these schools. The difference was sufficiently large to be considered ‘educationally significant’ after three years.

Total absence rates in schools that had been participating in Creative Partnerships for four years were almost a whole percentage point lower than in otherwise comparable schools with no history of involvement with Creative Partnerships. This difference amounts to a relative reduction of about a fifth in absence rates within Creative Partnerships schools over a period of four years.

Because only school-level data was available, it is not possible to say whether these reductions in absence rates were associated with particular groups of young people (i.e. those taking part in Creative Partnerships activities). It is also not known why there were no such associations between the Creative Partnerships programme and absence rates in secondary schools, although it is possible that Creative Partnerships had an effect on a higher proportion of pupils in primary schools because of the smaller number of pupils involved. The lack of a measurable effect of participation in Creative Partnerships on permanent exclusion rates in either primary or secondary schools may be due to the fact that exclusions are relatively rare, making it more difficult to show an impact on this measure.

1. Introduction

Creative Partnerships is the Government's creative learning programme, designed to develop the skills of young people across England, raising their aspirations and achievements, and opening up more opportunities for their futures. It started in 2002 with 398 core schools in 16 deprived areas of England.

Between Autumn 2002 and Summer 2004, the National Foundation for Educational Research (NFER) conducted a programme-level evaluation of Creative Partnerships (Sharp *et al.*, 2006). It focused on measuring changes in self-confidence, self-esteem and attitudes to learning amongst young people who took part in Creative Partnerships activity. However, the evaluation was not intended to address the issues of the impact that involvement in Creative Partnerships may have on pupil performance. In consultation with Arts Council England, NFER undertook two separate studies considering whether Creative Partnerships has had a significant positive impact on educational attainment (Eames *et al.*, 2006 and Kendall *et al.*, 2008).

Arts Council England was interested in examining whether schools' engagement with Creative Partnerships was associated with improvements in young people's attendance and behaviour at school. This report compares schools involved in Creative Partnerships with other similar schools to explore this hypothesis.

2. Approach

To evaluate an association between participation in the Creative Partnerships programme and improved outcomes, the most powerful analysis would make use of information relating to individual young people. However, pupil-level analysis was not possible for the following reasons:

- although the Department for Children, Schools and Families (DCSF) has recently started collecting attendance data for individual young people, for most of the period since the inception of Creative Partnerships attendance data exist only at aggregate school level
- although individual level exclusion data has been collected for some time, the sensitivity of this information is such that it is treated as highly confidential and again only aggregate information is available from DCSF.

Therefore, this report makes use of school-level data. Further information about the data and analysis is given in the Appendix.

Because Creative Partnerships is targeted at disadvantaged areas, schools engaged with Creative Partnerships are likely to have higher levels of absence and exclusion than schools not involved in Creative Partnerships. By using the statistical technique of multilevel modelling, valid comparisons can be made between schools engaged with Creative Partnerships and those not so engaged.

This report examines the association between engagement in Creative Partnerships and absence rates. In particular, because any impact of Creative Partnerships on attendance is likely to take some time to become established, we examine the way in which absence rates change over time in Creative Partnerships schools when compared with schools not engaged in Creative Partnerships. Similarly, we explore the hypothesis that schools engaged in Creative Partnerships may become less likely to permanently exclude young people as Creative Partnerships becomes established in them.

3. Creative Partnerships and attendance at school

Figures published by DCSF (DCSF, 2008) show that the total absence rate in 2006/7 was just over five per cent in primary schools and just under eight per cent in secondary schools. Absence rates in special schools were rather higher, at over ten per cent. These published figures also indicate that absence rates have generally been declining in recent years. In this section we consider whether there has been a greater reduction in absence rates within Creative Partnerships schools than in similar schools which did not participate in Creative Partnerships.

3.1 Primary school attendance

Once a range of school factors such as type, size, overall attainment levels and extent of disadvantage had been taken into account, schools involved in Creative Partnerships had slightly higher levels of total absence in 2002/03 (the first year of Creative Partnerships activity) than other schools, by about 0.17 percentage points.

During subsequent four years, participation in Creative Partnerships was associated with a greater reduction in total absence rates than that in schools not engaged with Creative Partnerships (see Table 1 below).

Table 1: Reduction in total absence rates associated with participation in Creative Partnerships

Years in Creative Partnerships	Reduction in total absence rate %	Effect size
1	0.15	8.1
2	0.38	20.7
3	0.63	34.7
4	0.86	47.4
5	1.07	58.8

*Coefficients shown in **bold** are significant at the 95% level*

The table contains effect sizes, which represent the difference found by dividing the observed difference between two groups by the standard deviation of the scores in the relevant population. In this report, effect sizes have been scaled so that an effect size of 100 is equivalent to a difference of one standard deviation in the outcome. A useful rule of thumb in considering the importance of a given value is that an effect size of 25 or more is likely to represent a finding which is of educational, as well as statistical significance (Gray *et al.*, 1990, Slavin and Fashola, 1998). The US What Works Clearinghouse², which provides a highly regarded resource of evidence of ‘what works’ in education, also sets an effect size of at least 25 as the minimum level indicating that an educational intervention has an impact and that it may be worth consideration for wider adoption.

There are a number of trends evident in the data:

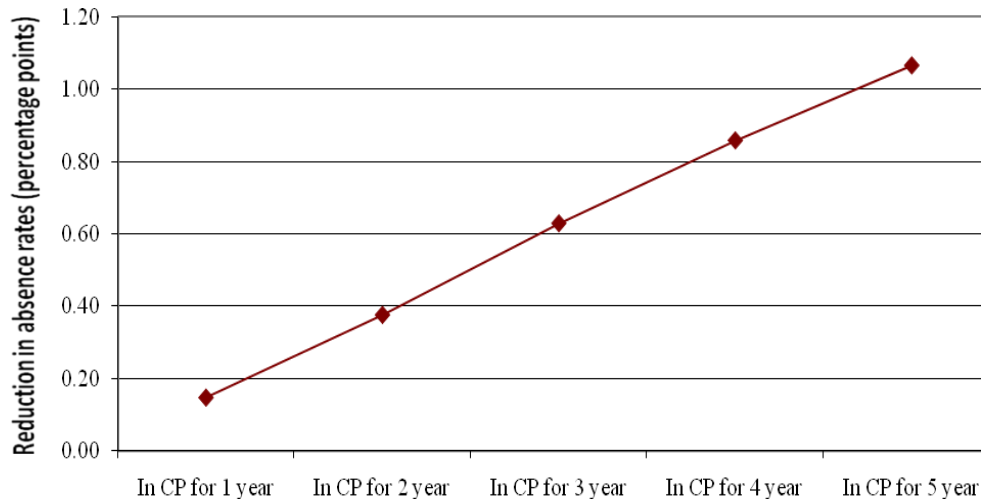
- The total absence rate in schools that had been in Creative Partnerships for one year was 0.15 percentage points less than that of otherwise comparable schools not engaged with Creative Partnerships. In other words, the reduction in total absence rates in these Creative Partnerships schools was 0.15 percentage points greater than that in schools not participating in Creative Partnerships.
- After another year of participation in Creative Partnerships, there was a further reduction in total absence rates (relative to schools not in Creative Partnerships) of 0.23 percentage points. Added to the 0.15 percentage point reduction in the first year, this gives an overall reduction in total absence rates in Creative Partnerships schools of 0.38 percentage points after two years.
- There were further relative improvements in Creative Partnerships schools after three, four and five years.³ The difference becomes educationally significant (indicated by an effect size of 25 or more) after the third year of involvement with Creative Partnerships.

² See <http://ies.ed.gov/ncee/wwc/>

³ Although note that the difference between the fourth and fifth years was not statistically significant. This is probably because there were relatively few schools with five years of participation in Creative Partnerships.

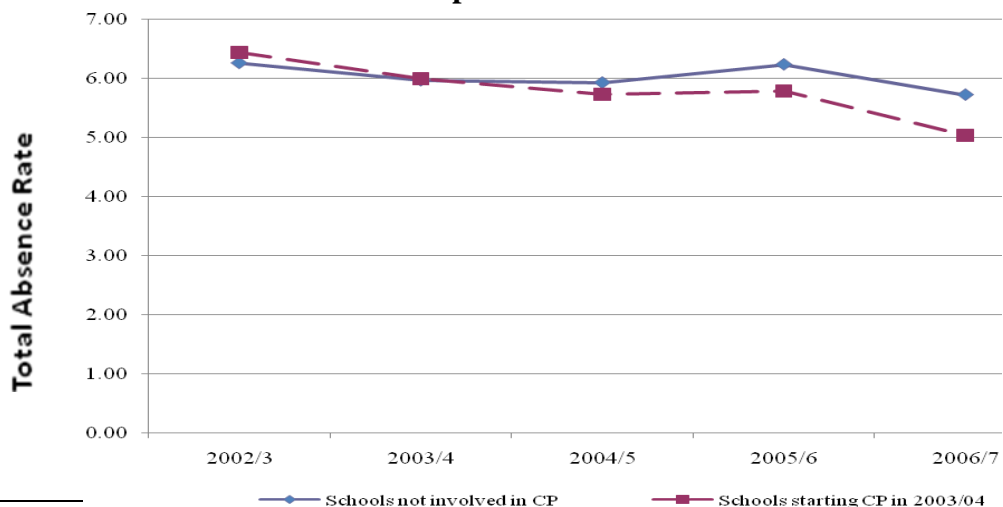
Figure 1 provides a graphic representation of the trend in the absence rates for primary schools involved in Creative Partnerships.

Figure 1: Relative reduction in total absence rates for primary Creative Partnerships schools



The values in Table 1 are based on all Creative Partnerships schools. It is also possible to compare schools joining Creative Partnerships in a given year with schools not participating in Creative Partnerships in any of the years 2002/3 to 2006/7. For example, Figure 2 compares the absence rates in primary schools that joined Creative Partnerships in 2003/4 with the rates in schools not in Creative Partnerships at any stage.⁴

Figure 2: Total absence rates for primary schools joining Creative Partnerships in 2003/04 and similar schools not involved in Creative Partnerships



⁴ These comparisons take account of relevant factors such as school type and the extent of disadvantage.

As can be seen in Figure 2, at the start of the period under consideration, and in the first year of participation in Creative Partnerships, absence rates were very similar in these two groups of schools. By the third year (2006/07), the reduction in total absence rates was noticeably greater in schools participating in Creative Partnerships than in those schools not taking part.

In summary, engagement with Creative Partnerships for at least three years was associated with a reduction of about one percentage point in total absence rates – a considerable difference given the average level of absence of about five per cent overall.

3.2 Secondary school attendance

As noted earlier, total absence levels in secondary schools are rather higher than those in primary schools but have been declining over recent years.

Absence rates in Creative Partnerships schools were not significantly different from those in otherwise similar schools, having taken account of school factors such as size, type, level of disadvantage and attainment level. There were also no statistically significant associations between reductions in absence rates and participation in Creative Partnerships.

4. Creative Partnerships and permanent exclusions from school

For each of the years 2002/3 to 2005/6, schools were categorised into one of two groups:

- schools with no permanent exclusions in the relevant year
- schools with one or more such exclusions.

The statistical analysis then explored the hypothesis that the proportion of schools with at least one exclusion per year declined more rapidly among Creative Partnerships schools than among those not engaged with Creative Partnerships, having taken relevant school factors such as type and disadvantage into consideration.

4.1 Primary school exclusions

Permanent exclusion from a primary school is relatively uncommon: in 2005/6 about 1000 young people were permanently excluded from primary schools. In any one year only about one primary school in 20 will permanently exclude any of its pupils.

There was no statistically significant association between participating in Creative Partnerships and the overall probability of excluding one or more young people. There was also no evidence that longer term participation in Creative Partnerships was associated with a reduced probability of exclusion.

4.2 Secondary school exclusions

The findings for secondary schools were similar to those in primary schools. There was no statistically significant association between participating in Creative Partnerships and the overall probability of excluding one or more young people. There was also no evidence that longer term participation in Creative Partnerships was associated with a reduced probability of exclusion.

5. Summary and conclusions

This report uses school-level aggregate data to compare absence rates and exclusions in Creative Partnerships schools with those in schools not participating in Creative Partnerships.

No statistically significant relationships were found between participation in Creative Partnerships and absence rates for secondary schools. Similarly, no relationships were found between reductions in the proportions of schools permanently excluding any young people in a given academic year and participation in Creative Partnerships – this may be because permanent exclusion is a relatively rare event.

There were, however, differences in rates of absence within primary schools. Figures published by the DCSF show that the total absence rate in primary schools in 2006/7 was just over five per cent and that absence rates have generally been declining in recent years. Participation in Creative Partnerships was shown to be associated with an educationally significant reduction in total absence rates in primary schools and this reduction continued over a period of years as Creative Partnerships became more established in these schools. Total absence rates in schools that had been participating in Creative Partnerships for five years were almost one percentage point lower than in otherwise comparable schools with no history of involvement with Creative Partnerships.

Because only school-level data was available, it is not possible to say whether these reductions in absence rates were associated with particular groups of young people, such as those taking part in Creative Partnerships activities.

References

Department for Children, Schools and Families (2007). *Permanent and Fixed Period Exclusions from Schools and Exclusion Appeals in England, 2005/06* (National Statistics First Release 21/2007). London: DfES [online]. Available: <http://www.dfes.gov.uk/rsgateway/DB/SFR/s000733/SFR21-2007.pdf> [14 July, 2008].

Department for Children, Schools and Families (2008). *Pupil Absence in Schools in England, Including Pupil Characteristics: 2006/07* (National Statistics First Release 05/2008). London: DfES [online]. Available: <http://www.dfes.gov.uk/rsgateway/DB/SFR/s000775/SFR05-2008-rev.pdf> [14 July, 2008].

Eames, A., Benton, T., Sharp, C. and Kendall, L. (2006). *The Impact of Creative Partnerships on the Attainment of Young People: Final Report*. Slough: NFER [online]. Available: <http://www.nfer.ac.uk/publications/pdfs/downloadable/cps.pdf> [14 July, 2008].

Kendall, L., Morrison, J., Yeshanew, T. and Sharp, C. (forthcoming, 2008). *The Longer-term Impact of Creative Partnerships on the Attainment of Young People: Results from 2005 and 2006*.

Sharp, C., Pye, D., Blackmore, J., Brown, E., Eames, A., Easton, C., Filmer-Sankey, C., Tabary, A., Whitby, K., Wilson, R. and Benton, T. (2006). *National Evaluation of Creative Partnerships. Final Report* [online]. Available: <http://www.creative-partnerships.com/content/researchAndEvaluationProjects/201083/201578> [21 November, 2007].

Slavin, R.E. and Fashola, O.S. (1998). *Show Me the Evidence! Proven and Promising Programs for America's Schools*. London: Corwin Press.

Appendix

A1 The datasets used

Data on school absence rates and exclusions from school were provided by DCSF. This appendix provides more detail about this information.

Results are given separately for primary and secondary schools. Special schools have been included in the appropriate analysis depending on the ages of the majority of the young people attending them.⁵

A1.1 Attendance at school

Attendance data is collected in terms of the percentage of half days missed during a school year, for young people of compulsory school age. That is, the figures include absences from school only for young people aged five to 16 and exclude, for example, young people in school sixth forms. Absences are recorded as either authorised, where the headteacher has given permission for the young person to be absent, e.g. for reasons of illness or to attend a medical appointment, or unauthorised. Most absences are authorised: for example, for young people attending primary schools, the authorised absence rate is about five per cent of half days, while for unauthorised absences the rate is less than half of one per cent of half days. The distinction between an authorised and an unauthorised absence is not always clear-cut. For example, headteachers have discretion as to whether to authorise absence for family holidays. As such holidays account for a considerable proportion of all absences, the way in which headteachers use this discretion can have a considerable influence on recorded figures authorised and unauthorised absence. For this reason, this report considers only the total absence rate

Because only school aggregate information is available, two schools may have similar overall attendance figures but with different patterns of attendance. In one school, the absences may relate to a relatively small number of young

⁵ Because of the age range of the young people attending them, some special schools were included in both the primary and secondary analyses. However, it is not possible to disaggregate the overall attendance and exclusions data for each school into primary and secondary components for these schools.

people, each absent on many occasions, while in another school a larger proportion of young people are missing occasional half days. There may also be differences across age groups within the school, for example with one school having a particularly high absence rate in one year group while in another school the absences are more evenly distributed across age groups. In particular, it is not possible to compare the attendance of young people directly engaged in Creative Partnerships activities with that of other young people in the same schools.

This report looks at changes in absence rates for the academic years from 2002/3 to 2006/7. For most of these years, information on absences was collected (by DCSF and its predecessors) from schools through an annual Absence in Schools Survey. This survey collected information on the percentage of half days missed due to absence for the relevant school year up to the summer half term break.

From 2006/7, absence information is being collected at individual pupil level through the School Census. This information also covers the period up to the summer half term. This discontinuity in the data collection may result in some lack of comparability over time, but there is no reason to believe that the effect of the change would differ between Creative Partnerships schools and those not participating. For further information, see DCSF (2008).

A1.2 Exclusion from school

Exclusion from school can be either permanent or for a fixed term, usually a small number of days. Due to concerns about the sensitivity of information on fixed term exclusions, the DCSF was not able to provide figures for these.

This report covers exclusions in the period from 2002/3 to 2005/6. Information is gathered annually from schools, covering the preceding academic year.

Numbers of permanent exclusions are very low. For example, there were 9,170 permanent exclusions from primary, secondary and special schools in 2005/6, which represents 0.12 per cent of all young people of compulsory school age attending maintained schools (see DCSF, 2007). Permanent exclusions as a percentage of pupils within a school can be misleading and can vary very markedly within a school from year to year. For example, a ‘one-

off' incident in a school may lead to a number of exclusions in one academic year in a school that has no record of any such exclusions for several years previously. For this study, schools are categorised by whether or not they had any permanent exclusions in each of the years under consideration.

A2 Numbers of Creative Partnerships schools included in the analysis

Schools that had been involved with Creative Partnerships were identified using information provided by Arts Council England. Table A1 below summarises the numbers of schools participating in Creative Partnerships and included in the statistical analysis by academic year. Some schools with a very short period of involvement were eliminated from the analysis, as were some schools with incomplete or missing attendance or exclusion data and schools which could not be matched with information provided by DCSF.

Table A2.1 Creative Partnerships schools by academic year

Academic year	Primary	Secondary
2002/3	50	32
2003/4	135	87
2004/5	327	179
2005/6	433	232
2006/7*	284	156

* Attendance models only

Overall, the analysis of primary schools included 472 Creative Partnerships schools, and the analysis of secondary schools included 246 Creative Partnerships schools (with 33 schools included in both sets of analysis).

A3 Multilevel modelling

A statistical technique known as multilevel modelling was used to compare Creative Partnerships schools with those not taking part in Creative Partnerships, when a wide range of relevant background factors were taken into account. These factors included school type, region and governance, the ethnic composition of the school, the proportion of pupils entitled to free

school meals, and a range of measures of disadvantage related to the area in which the school was located.

Multilevel modelling is a development of a common statistical technique known as 'regression analysis'. It is used for finding the relationship between a measure of interest (in this case, measures of absence or exclusion from school) and one or more other related variables. This technique takes account of a wide range of factors relating to schools and the results of the analysis estimate the differences in absence rates (or the probability of excluding at least one young person) that would be seen if background and contextual characteristics were equal between the groups being compared.

Multilevel modelling takes account of the fact that data is grouped into similar clusters at different levels. For example, individual schools are grouped within local authorities (LAs). For the work reported here, there are measures of attendance and exclusions at multiple time points for each school. These measures may be more consistent for the multiple time points within any one school than they are across all schools. Similarly, schools within an LA may be more similar than schools in general. By taking account of this hierarchical structure, multilevel modelling produces more accurate estimates of differences between groups and their statistical significance than would be obtained using other methods.

Table A3.1 Primary school total absence rates: coefficients from multilevel modelling

Description of background variable	Coefficient
Constant	0.0690
2003/04	0.0094
2004/05	0.0094
2005/06	0.0095
2006/07	0.0097
Schools in Creative Partnerships	0.0564
In Creative Partnerships for 1 year	0.0507
In Creative Partnerships for 2 years	0.0533
In Creative Partnerships for 3 years	0.0689
In Creative Partnerships for 4 years	0.1042
In Creative Partnerships for 5 years	0.2050
North East	0.1156
North West	0.0956
Yorkshire	0.0987
East Midlands	0.1019
West Midlands	0.1072
Eastern	0.1176
South East	0.0977
South West	0.1061
Church of England school	0.0197
Roman Catholic school	0.0279
School with missing faith information	0.3599
Boys school	0.1634
Missing school sex information	0.3078
Junior school	0.0270
Infant school	0.0255
First school	0.0290
Special school	0.1726
% white population in the area	0.0107
% Asian population in the area	0.0106
% Black population in the area	0.0122
% Chinese population in the area	0.0165
% of pupils entitled to free school meals	0.0008
% of pupils with English as an additional language	0.0008
% of pupils with identified special educational needs	0.0018

Description of background variable	Coefficient
Pupil teacher ratio	0.0016
Overall KS1 performance of the school	0.0003
Overall KS2 performance of the school	0.0002
General measure of deprivation (employment, education, tenancy, lone parenthood and health)	0.0146
Low proportion of white people and overcrowding	0.0490
Population mobility	0.0079
Population density	0.0007

*Coefficients shown in **bold** are significant at the 95% level*

Table A3.2 Proportion of primary schools with at least one permanent exclusion: coefficients from multilevel modelling

Description of background variable	Coefficient
Constant	-2.9740
2003/04	0.1545
2004/05	-0.0101
2005/06	-0.1225
Schools in Creative Partnerships	-0.2349
In Creative Partnerships for 1 year	-0.0208
In Creative Partnerships for 2 years	-0.0539
In Creative Partnerships for 3 years	0.6482
In Creative Partnerships for 4 years	0.7963
North East	-0.9778
North West	-0.5042
Yorkshire	-0.6830
West Midlands	-0.5801
Church of England school	-0.1122
Roman Catholic school	-0.4293
Junior school	0.3628
Infant school	-0.8808
First school	-0.2487
% mixed ethnicity population	0.1540
% of pupils entitled to free school meals	0.0150
% of pupils with English as an additional language	-0.0028
% of pupils with identified special educational needs	0.0384
Size of school	0.0027
Overall KS1 performance of the school	-0.0024
Overall KS2 performance of the school	-0.0098
General measure of deprivation (employment, education, tenancy, lone parenthood and health)	0.3581
Low proportion of white people and overcrowding	-0.3799
Population mobility	0.0764
Population density	0.0063
Special school	-3.1260

*Coefficients shown in **bold** are significant at the 95% level*

Table A3.3 Secondary school total absence rates: coefficients from multilevel modelling

Description of background variable	Coefficient
Constant	9.3830
2003/04	-0.2278
2004/05	-0.3655
2005/06	-0.1994
2006/07	-0.2960
Schools in Creative Partnerships	0.0648
In Creative Partnerships for 1 year	0.1837
In Creative Partnerships for 2 years	-0.0655
In Creative Partnerships for 3 years	-0.0772
In Creative Partnerships for 4 years	0.0541
In Creative Partnerships for 5 years	0.1008
North East	-2.0250
North West	-1.0220
Yorkshire	-1.1630
East Midlands	-0.8360
West Midlands	-1.2800
Eastern	-0.4447
Church of England school	-0.7765
Roman Catholic school	-0.8266
School with missing faith information	-1.6940
Boys school	2.3400
Community special school	0.8910
% White population in area	0.0699
% mixed ethnicity population in area	0.5301
% Black population in area	-0.0828
% of pupils with English as an additional language	-0.0091
% of pupils with identified special educational needs	0.0142
Level of GCSE performance of school	-0.0067
General measure of deprivation (employment, education, tenancy, lone parenthood and health)	2.4690
Low proportion of white people and overcrowding	2.0180
Population mobility	0.5181
Population density	-0.0275
Interaction: Creative Partnerships school and deprivation	-0.8689

*Coefficients shown in **bold** are significant at the 95% level*

Table A3.4 Proportion of secondary schools with at least one permanent exclusion: coefficients from multilevel modelling

Description of background variable	Coefficient
Constant	1.0760
2003/04	0.2440
2004/05	0.1746
2005/06	0.1979
Schools in Creative Partnerships	-0.1636
In Creative Partnerships for 1 year	0.1045
In Creative Partnerships for 2 years	-0.0357
In Creative Partnerships for 3 years	0.3144
In Creative Partnerships for 4 years	0.4555
South East	0.4685
Roman Catholic school	-0.3835
Schools of other faith	-0.8359
Girls school	-1.1330
Special school	-5.4900
% of pupils with English as an additional language	-0.0103
% of pupils with identified special educational needs	0.0237
Level of KS3 performance of school	-0.0097
Level of GCSE performance of school	-0.0029
General measure of deprivation (employment, education, tenancy, lone parenthood and health)	0.2616
Population density	0.0140

*Coefficients shown in **bold** are significant at the 95% level*