Systematic review

What works to improve teacher attendance in developing countries?

A systematic review

by Gabriela Guerrero
Juan Leon
Mayli Zapata
Claudia Sugimaru
Santiago Cueto

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List of abbreviations

3ie	International Initiative for Impact Evaluation
CALDER	US National Center for Analysis of Longitudinal Data in Education Research
DFID	UK Department for International Development
EDUCO	Education con Participacion de la Comunidad
ERIC	Education Resources Information Center
GRADE	Grupo de Análisis para el Desarrollo
ITT	intention to treat
NBER	National Bureau of Economic Research
NGO	non-governmental organisation
OECD	Organisation for Economic Co-operation and Development
PICO	population, intervention, comparator and outcome
PROHECO	Programa Hondureño de Educación Comunitaria
RCT	randomised controlled trial
RePEc	Research Papers in Economics
SD	standard deviation
SSCI	Social Sciences Citation Index
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNESDOC	UNESCO's documents and reports

Abstract

Previous studies have found national averages of teacher absenteeism in developing countries that range from 3 percent to 27 percent. However, within countries absenteeism is larger in poorer, more isolated schools, contributing to unequal educational opportunities. The purpose of this paper is to report on a systematic review of research on the effectiveness of interventions aimed at increasing teacher attendance in developing countries, as measured by the rate of teacher attendance. Whenever data are available we also estimate the impact of these programmes on student achievement.

We used the following inclusion criteria to identify potentially relevant primary studies: (i) *scope*: studies that examined the impact of programmes aimed at increasing teacher attendance/reducing teacher absenteeism (a measure of teacher attendance was required); (ii) *geographical location*: studies conducted in developing countries; (iii) *population*: studies carried out with teachers in primary or secondary education institutions; (iv) *study design*: quantitative studies using experimental or quasi-experimental designs; and (v) *date*: studies published from 1990 to July 2010, inclusive.

After a comprehensive search process, we identified nine studies that met the inclusion criteria and were included in the review. The interventions that these studies analysed could be classified into two broad categories: (i) direct interventions, where the main goal was to reduce teacher absenteeism, and (ii) indirect interventions, where reducing teacher absenteeism was an intermediate objective or a mechanism to reach the ultimate goal of improving student achievement. For the statistical synthesis of the studies, we did not consider three studies because not all the information necessary to calculate their effect sizes was available. Given the small number of included primary studies and the different types of intervention design across them, we did not perform a meta-analysis to synthesise information across studies and we only present the effect sizes of included studies in forest plots.

Our findings show that direct interventions coupling monitoring systems with rewards have a positive and statistically significant effect on teacher attendance and no effect on student achievement. For indirect interventions, we found that involving the community in students' education and providing incentives schemes for students had a positive and significant effect on teacher attendance, but neither strategy had an effect on student achievement.

Although improving attendance is not straightforward, the results of the systematic review provide evidence that a combination of monitoring and incentives seems effective in tackling teacher absenteeism. At the same time, the systematic review makes it clear that a teacher in the classroom is an important but insufficient pre-requisite for improving achievement. We suggest that the quality of the pedagogical processes taking place within the classroom is also crucial to explain students' achievement.

Executive summary

Background and objectives

Studies have found national averages of teacher absenteeism in developing countries that range from 3 percent to 27 percent. However, within countries absenteeism is larger in poorer, more isolated schools, contributing to unequal educational opportunities. Having a teacher in the classroom is an important pre-requisite to promote students' learning and other outcomes, thus different programmes have been implemented lately to tackle teacher absenteeism. Increasing teacher attendance may be sought by some form of direct or indirect intervention.

As shown discussed in this paper there are impact studies examining the effects of particular interventions in reducing teacher absence; however, to our knowledge, there are no systematic reviews of research on this topic, perhaps because rigorous evidence has only recently become available. The purpose of this paper is to report on a systematic review of research on the effectiveness of interventions aimed at increasing teacher attendance in developing countries. This review was commissioned by DFID (UK Department for International Development) as part of its Systematic Review Programme, aimed at providing policy-makers and practitioners with a robust assessment of the evidence base as they develop policies and programmes.

Although the focus of this review is to summarise research on the effects of interventions designed to increase teacher attendance, it does not ignore the longer-term, important outcome of student achievement in school. There have been studies in which the association between teacher attendance and student achievement in standardised tests has been established empirically. When studies included necessary information, we conducted analyses to determine whether or not programmes aimed at increasing teacher attendance also increased student achievement.

Methods

We used the following inclusion criteria to identify potentially relevant primary studies: (i) *scope*: studies that examined the impact of programmes aimed at increasing teacher attendance/reducing teacher absenteeism (the inclusion of a measure of teacher attendance in the study was mandatory); (ii) *geographical location*: studies conducted in developing countries; (iii) *population*: studies carried out with teachers in primary or secondary education institutions; (iv) *study design*: quantitative studies using (a) experimental (randomised controlled trials [RCTs]) or (b) quasi-experimental designs (experiment with no random allocation to groups but adequate controls, e.g. instrumental variables, matching, and double and triple difference-in-difference studies); and (v) *date*: studies published from 1990 to July 2010, inclusive.

With regard to the search strategy, three key concepts were combined: teachers (population), intervention, and attendance (outcome of the intervention). We did not include methodological filters for the retrieval of specific study designs. The search for these terms was restricted to the title, abstract and keywords fields in the following databases: British Library for Development Studies (limited to the topic of Education), EconPapers, EconLit, EBSCO (searching: SocINDEX, Educational Research Complete, and Psychology and Behavioral Sciences Collection), ERIC,

JSTOR (limited to the following databases: Economics, Education, Psychology, Public Administration, and Sociology), National Bureau of Economic Research (NBER), Oxford University Press Journals (limited to the subject of Social Sciences), Pro-Quest (limited to the following subjects: Economics, Education, Psychology, and Social Sciences), PsycINFO, RePEc/IDEAS, SAGE Journals Online (limited to the following topics: Education, Management and Organization studies, Psychology and Counseling, Public Administration, Research Methods and Evaluation, and Sociology), Science Direct (limited to the following subjects: Economics, Psychology and Social Sciences), Sociological Abstracts, UNESDOC (UNESCO's documents and reports), and World Bank Documents and Reports. Additionally, we searched Google Scholar. As a general rule, the search was conducted in English. Only for Google Scholar, the World Bank Documents and Reports database, and UNESDOC did we repeat the search with equivalent terms in Spanish, French and Portuguese.

Besides searching the above databases, we also searched the website of the Abdul Latif Jameel Poverty Action Lab and contacted key researchers working in the education field and asked them to help us identify other papers or relevant programmes that we should include in the review. We also used back-referencing with included articles as a strategy to identify relevant primary studies. Finally, we conducted a handsearch of the following journals: *Comparative and Education Review, Compare, International Journal of Educational Management*, and *Journal of Educational Administration*.

Following the EPPI-Centre guidelines, we developed a coding tool to identify, extract and code information about the primary studies for the systematic review. Codes cover both the intervention's objectives and design, and the programme evaluation design and results. In order to assess the methodological quality of primary studies considered for this systematic review, we developed a critical appraisal tool to classify studies as high, medium or poor quality based on Slavin's (2008) suggestions on programme evaluation syntheses.

First we conducted a narrative analysis of causal chain information contained in the studies with the purpose of explaining how interventions unfolded and more specifically what the key mechanisms in explaining why interventions succeeded were. Second, the results of the original studies had to be converted to a common metric in order to compare the results from studies that used different measures of the same constructs. For this particular statistical synthesis, we used effect sizes to compare studies.

Results

Search results

The searches returned over 18,500 papers. All records were uploaded to EPPI-Reviewer 4.0 and screened for duplicate records. We first removed duplicates (6,365) and re-counted all unique papers identified in the search (12,159). Then three researchers systematically reviewed those papers, excluding the majority of them after reviewing titles and abstracts. As a result, 55 papers were identified as potentially relevant and the full text copies were obtained and uploaded to EPPI-Reviewer 4.0. These papers were reviewed; nine papers met the inclusion criteria and were included in the review. All papers identified for inclusion were in English, with the exception of one in Spanish (Cueto et al. 2008). The interventions behind the studies can be classified into two broad categories: (i) direct interventions, where the main goal was to reduce teacher absenteeism, and (ii) indirect interventions, where reducing teacher absenteeism was an intermediate objective

or a mechanism to reach the ultimate goal of improving student achievement. The latter can be further divided into four types: (a) programmes aimed at increasing parental and community participation, hoping this will raise teacher attendance; (b) programmes providing incentives to teachers for increases in student achievement (output-based incentive programmes); (c) programmes offering incentives scholarships for students, hoping they (and their parents) would demand teacher attendance at school; and (d) programmes tracking students by achievement, hoping that the homogenous composition of the class would have an effect on teacher effort (including attendance). We classified seven studies as high quality and two as medium quality.

Synthesis results

In those cases where more than one effect size per study was available, we calculated a weighted average effect size[1] for independent samples and a simple mean average for effect sizes from the same sample. We did not pool the effect sizes across studies because the programme interventions included in our final analytical sample were not strictly comparable, and even if we assumed they were, the maximum number of studies for each pooled effect size was two.

Across studies, we found a positive and statistically significant effect of direct interventions on teacher attendance. Duflo and Hanna (2005) (effect size: 0.23, $p<0.05$) and Cueto et al. (2008) (effect size: 0.52, $p<0.05$) showed that coupling monitoring systems with rewards is an effective mechanism to reduce teacher absenteeism. A higher effect size on teacher attendance was found in the study by Cueto et al. (2008) but this study had a smaller and more unbalanced sample size per intervention group than Duflo and Hanna's (2008)[2] study.

For indirect interventions, we found that Jimenez and Sawada (1998) (effect size: 0.27, $p<0.05$), and Kremer et al. (2009) (effect size: 0.16, $p<0.05$) reported small but significant effects on teacher attendance, suggesting that it is possible to reduce teacher absenteeism through community involvement or programmes oriented to give students scholarships. However, neither strategy had an effect on student achievement.

Conclusions and recommendations

Although improving attendance was not straightforward, results provided evidence that a combination of better monitoring and powerful incentives seems effective in tackling teacher absenteeism. In that sense, it was interesting to note that the four interventions that succeeded in improving teacher attendance had some form of monitoring.

Most interventions aimed to increase teachers' attendance by offering monetary incentives; only one tried to alter their workload to increase their satisfaction and eventually reduce absenteeism. However, factors such as improving the work environment or promoting professional development could also be considered as tools to improve teacher absenteeism. At the school and educational system level, there was an emphasis on creating and strengthening monitoring systems, but the impact of other relevant variables, such as group norms, school principal

[1] The formula used to calculate the weighted independent effect sizes was $ES_{ws} = \Sigma (ES_i/SE_i)/(\Sigma(1/ES_i)$, taken from Hedges et al. (1989).

[2] Slavin and Smith (2008) found that there is an indirect relationship between sample size and effect sizes, and it is more likely that studies with smaller sample sizes will have bigger effect sizes than bigger samples.

leadership and teacher administrative duties, could be tested in rigorous impact evaluations.

Overall, it would seem that having a teacher in the classroom is an important but insufficient pre-requisite for improving achievement. The quality of the pedagogical processes within the classroom also needs to be considered (included studies did not provide information on what happened during the increased time of attendance).

Given the small number of included studies it is clear that more research on teacher absenteeism and its effect on student outcomes is needed. Establishing how, where and why teacher incentives programmes succeed or fail in increasing attendance and improving student achievement remains an important priority. Hence, future research needs to focus on interventions and studies that would not only increase teachers' presence, but would also help them use this time in pedagogical activities so that student achievement is indeed increased.

1. Background

1.1 Aims and rationale for the review

Teacher absence is a common and serious problem in developing countries, thus limiting the opportunities for students to learn. Based on the assumption that a teacher in the classroom is an important pre-requisite to promote students' learning and other outcomes, different types of intervention have been implemented in past years to tackle teacher absenteeism in developing countries. Increasing teacher attendance may be sought by some form of direct or indirect intervention. In the case of direct interventions, most of them attempt to raise teacher attendance through external monitoring and/or monetary or non-monetary incentives. On the other hand, the ultimate goal of indirect interventions is not improving teacher attendance per se, but they all consider it as a mechanism in their impact theory. Examples of these types of intervention include: programmes aimed at improving school management and supervision, interventions providing incentives to teachers for improving student achievement (output-based incentives), programmes providing incentives to students (such as merit scholarships), and programmes tracking students by prior academic achievement (Banerjee and Duflo 2006, Rogers and Vegas, 2009).

As shown below, there are impact studies examining the effects of particular interventions in reducing teacher absence; however, to our knowledge, there are no systematic reviews of research on this topic assessing data from developing countries, perhaps becauserigorous evidence has only recently become available.

Therefore the purpose of this paper is to report on a systematic review of research on the effectiveness of interventions aimed at increasing teacher attendance in developing countries. This review was commissioned by DFID (UK Department for Intyernational Development) as part of its Systematic Review Programme, aimed at providing policy-makers and practitioners with a robust assessment of the evidence base as they develop policies and programmes.

Although the focus of this review is to summarise research on the effects of interventions designed to increase teacher attendance, it does not ignore the longer-term, important outcome of student achievement in school. There have been studies in which the association between teacher attendance and student achievement in standardised tests has been established empirically (Das et al. 2005, Suryadarma et al. 2006). When studies included necessary information, we conducted analyses to determine whether or not programmes aimed at increasing teacher attendance also increased student achievement.

Before turning to the methods used in this review, we discuss the current literature on teacher attendance and provide a theoretical framework for it.

1.2 Teacher absenteeism in developing countries: research background

A teacher in the classroom is an important pre-requisite for learning to take place, but it is clearly not the only one. Student learning is the result of a complex process in which not only are the inputs important, but also the educational processes taking place in the classroom. For example, UNESCO (2004) has postulated a model of educational quality that includes teacher characteristics, learning time, learning of reading and writing as a priority area, pedagogical methods, language of instruction, learning materials, infrastructure and leadership (mostly of school principals).

Although we recognise all of the above as important factors to promote student achievement, which is a very important outcome, this paper focuses only on teacher attendance which, according to the model mentioned above, should be linked with learning time. More specifically, we report on a systematic review of the effectiveness of interventions to improve teacher attendance in the classroom in developing countries. In what follows, we explore some of the main issues related to the importance of teacher attendance and the main factors associated with this variable.

1.2.1 Magnitude of the problem of teacher absenteeism

The number of days of instruction varies across countries. According to the OECD Indicators (2009), the average days of instruction for OECD (Organisation for Economic Co-operation and Development) countries is 190 days per school year. The number of expected days of instruction in developing countries would not seem to be so different. However, the situation is completely different when we compare the rate of teacher absenteeism, which is considerably higher in developing countries (Clotfelter et al. 2009, Miller 2008).

In the mid-1990s, a pilot study on the conditions of schools in 14 developing countries included a question for school principals on teacher absenteeism. The researcher asked if a teacher at school had been absent 'last week'. On average, teachers were present all week for 70 percent of the students (Postlethwaite 1998). However, this study did not provide a direct measure of teacher attendance.

More recently, the World Bank carried out a series of national studies on patterns of teacher absenteeism, verifying attendance through unannounced visits. In their report on six countries (Chaudhury et al. 2006), the authors found that primary schoolteachers were absent 19 percent of the time; this ranged from 11 percent to 27 percent (i.e. Bangladesh 16 percent, Ecuador 14 percent, India 25 percent, Indonesia 19 percent, Peru 11 percent, and Uganda 27 percent). For some countries in this study, more detailed results were available. For instance, in Bangladesh, primary schoolteachers were absent 15.5 percent of the time, while secondary schoolteachers were absent 17.6 percent of the time (Chaudhury et al. 2004a). In India the rate of teacher absenteeism was 25 percent for primary schools, with only half of the teachers present at schools, in classrooms, at scheduled times (Kremer et al. 2005). In Peru, researchers found a rate of 11 percent absenteeism in primary schools (Alcázar et al. 2006).

There have been a few studies conducted in other countries. A study developed in Botswana, Malawi and Uganda (Bennell et al. 2002) found that teacher absenteeism was around 3–6 percent at the primary level, with Botswana showing the highest rate (6 percent); and between 3 percent and 11 percent at secondary level, with Uganda showing the highest rate (11 percent).

A study in Kenya suggested that teachers from rural schools were absent 20 percent of the time (Glewwe et al. 2010). In Zambia, teachers were absent 18 percent of the time (Das et al. 2005), and in Pakistan, the absence rate was 10 percent for teachers at primary level (Reimers 1993). Finally, in Papua New Guinea, the absence rate was 15 percent (NRI and World Bank 2003).

So, summarising, teacher absenteeism rates vary across countries, ranging from 3 percent in Malawi to 27 percent in Uganda. However, national figures hide wide within-country disparities among schools, as shown in the next section.

1.2.2 Factors associated with teacher absenteeism

Studies have focused not only on the magnitude of teacher absenteeism, but also on the factors that are associated with teacher absenteeism. In this section, we present some of these findings.

Postlethwaite (1998) found in his study that the main reasons for teachers being absent were health, family matters and training courses. However, these results could be confounded by biases in reports from school principals. Di Gropello and Marshall (2004) found that training was the most common cause of teacher absenteeism in a PROHECO (Programa Hondureño de Educación Comunitaria) school in Honduras (a project to improve schooling by enhancing parental participation in the administration of the school services); however this might have been due to PROHECO teachers being younger and less experienced than those in the control schools, and thus being targeted for more training. On the other hand, Chaudhury et al. (2006) found that there was a positive association between national poverty and the rate of absenteeism. These authors also found thatschool principals were more often absent than teachers, and teachers were absent less often if they were females, or were born in the same district as the school, or worked in schools with better infrastructure. The authors reported few or no consequences for teachers being absent without justification.

Bennell et al. (2002) found differences by gender across countries, with higher absenteeism for female teachers at both primary and secondary levels. The main reasons for these absences, according to the data collected, were personal illness (26–50 percent in secondary schools in Botswana, and 38–42 percent in primary schools in Malawi) and work-related absence (e.g. attending in-service training workshops; 29–42 percent in primary schools in Uganda).

According to Chaudhury et al. (2004a), the main reason provided by teachers for being absent was that they had to perform out-of-school duties related to their work (this may explain why headteachers were absent more often than teachers). The absences were lower for privately-run schools compared to public schools. The authors found a negative association between frequency of inspections and teacher absenteeism.

In India (Kremer et al. 2005), the rate of teacher absenteeism was higher in the poorer states. Absenteeism was lower in schools that had had a recent inspection, were located closer to a paved road, or had better infrastructure. A similar result was found in Peru (Alcázar et al. 2006), with higher rates of teacher absenteeism for the more remote or poorer schools.

In Kenya (Glewwe et al. 2010), Zambia (Das et al. 2005), Pakistan (Reimers 1993) and Papua New Guinea (NRI and World Bank 2003), there seems to be a within-country correlation between teacher attendance and average poverty of the students at school. Hence, teacher attendance could be a source of inequality in the opportunities to learn at school, since poorer students are more likely to be in a classroom in which the teacher is absent. In the next section we turn to a theoretical framework to explain teacher absenteeism.

1.3 Theoretical model and interventions

1.3.1 Theoretical model of teacher attendance

In this section we present psychological and sociological models that have been developed to explain employee absenteeism in general and teacher absenteeism in particular. We then adapt these to teacher absenteeism in the context of primary and secondary schools in developing countries.

The models we describe below were developed during the late 1970s and early 1980s. In general terms, these identify two sets of factors that explain an employee's behaviour. The first set is related to the employee's values, expectations and satisfaction (Brooke 1986, Rhodes and Steers 1990, Steers and Rhodes 1978). The second set of factors is related to the social interactions and social norms within the employee's organisation (Chadwick-Jones et al. 1973, 1982, Geurts et al. 1994). According to these conceptual models, other sets of variables like employees' demographic characteristics (e.g. gender, age, level of education) and contextual characteristics (e.g. place of residence, poverty) have only an indirect effect on employees' absenteeism through the first two sets of factors described above.

More recently, several authors have developed different models of teacher absenteeism (Johns 2003, Price 1995, Rosenblatt and Shirom 2005, Scott and Wimbush 1991). Their work was based on models of employee absenteeism but they also recognised the importance of teachers' school-related factors (e.g. teacher satisfaction and organisation culture) in explaining teacher absenteeism. These models also include a direct effect of teachers' demographic characteristics on teacher attendance.

Based on a review of the initial conceptual models of employee absenteeism and the current literature on teacher absenteeism, we suggest there are three sets of factors that could affect teacher attendance/absenteeism: (i) teacher-level variables, (ii) school-level variables, and (iii) contextual-level variables. Below we describe these different sets of factors and their potential effect on teacher attendance.

1.3.1.1 Teacher-level variables

Teacher-level variables can be further divided into two groups: teachers' demographic variables such as age, education, gender and ethnicity; and teachers' school-related variables such as satisfaction with or commitment to different aspects of their work or profession.

According to the literature, teachers' demographic variables have an indirect effect on teacher attendance through their effect on teacher satisfaction or teacher commitment. Studies developed by Chapman and Lowther (1982), Murnane (1987), Perie et al. (1997), Ingersoll (2001), and Sargent and Hannum (2005) showed the existence of a link between teachers' demographic characteristics and teacher satisfaction. According to these authors, older, female, and less-qualified teachers were more satisfied with their job than younger, male and more qualified teachers.

Similarly, there have been studies (both quantitative and qualitative) about the direct effect of teacher satisfaction or teacher commitment (school-related variables) on teacher attendance. Teacher satisfaction with different aspects of their work such as their salary, the school environment (e.g. having a supportive school principal), their workload, and the availability of opportunities for professional development was found to have a significant and positive effect on teacher attendance (Abeles 2009, Corcoran et al. 1988, Dang and Rogers 2007, Firestone and Pennell 1993, Gaziel 2004, Imants and Van Zoelen 1995, Scott and Wimbush 1991).

It should be noted, however, that the effect of teachers' demographic characteristics on teacher attendance is not only indirect. Published research on teacher absenteeism has supported the idea of a direct effect of personal variables on teacher attendance even after introducing teacher school-related variables.

Studies by Price (1995), Johns (2003), Rosenblatt and Shirom (2005) and Usman et al. (2007) found that gender had mixed results, while age and level of education had a significant effect on teacher attendance, although the coefficient was not always the same (e.g. Usman et al. [2007] found a positive relation between level of education and absenteeism, while Rosenblatt and Shirom [2005] found a negative relation between these two variables).

In sum, we could say that teachers' demographic characteristics have a direct and indirect effect (through teacher satisfaction) on teacher attendance, while teacher school-related variables have only a direct effect.

1.3.1.2 School or educational system variables

This group of variables includes organisational factors within the school such as work group norms, the school principal's leadership style, supervision from local or state authorities, partnerships between the school and the community, and the time teachers must devote to the government's training workshops and administrative duties.

According to the literature, these variables could have a direct effect on teacher attendance. Different studies have found that schools where worker shirking is not accepted or it is not part of the social norm, that are inspected or supervised by the local/state authorities (at least once every three months), have a school principal who exhibits collegial behaviour, and are open to parents and community participation have higher teacher attendance rates (Alcázar et al. 2006, Bradley et al. 2007, Chaudhury et al. 2006, Gaziel 2004, Jimenez and Sawada 1998, King and Ozler 2005, Kremer et al. 2005).

Teacher absenteeism is not only related to school variables; sometimes it is the educational system that is responsible for teacher absences (e.g. teachers need to perform out-of-school duties related to their work; Chaudhury et al. [2004a]).

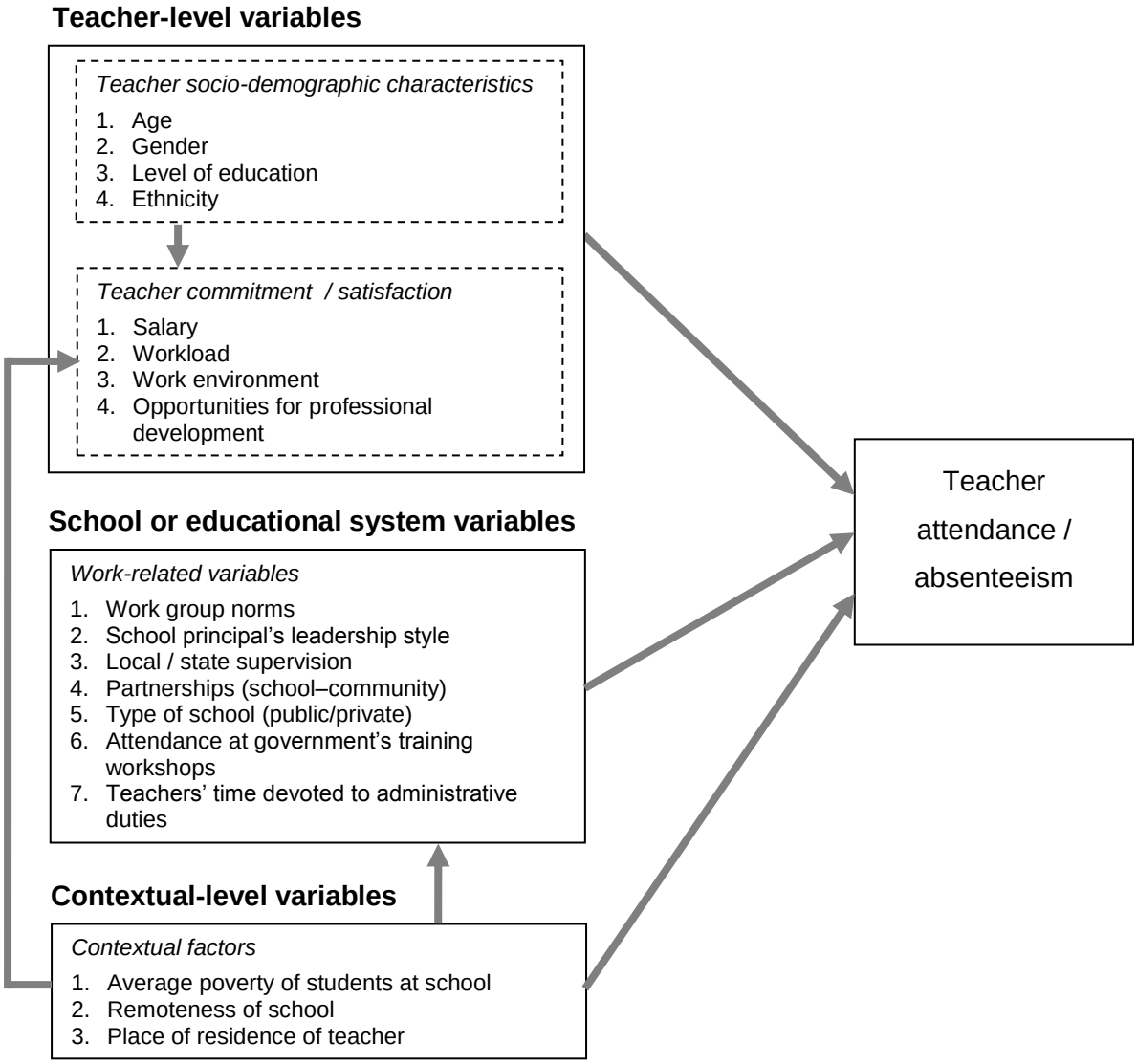
1.3.1.3 Contextual-level variables

Most of the conceptual models on employee or teacher absenteeism reviewed above do not propose a direct effect for contextual-level variables on teacher attendance. This may be due to such models being based on studies carried out in developed countries. Previous educational research in developing countries has shown that the context where a teacher works matters. For example, different studies have found a significant association between attendance and contextual variables. Among them, the location of the school (urban), the remoteness of the school (nearest paved road), and the level of poverty of the community where it is located (less poor) have been shown to be associated with higher teacher attendance (Alcázar et al. 2006, Bradley et al. 2007, Chaudhury et al. 2006, Kremer et al. 2005).

Contextual-level variables also have an indirect effect on teacher attendance through their effects on teacher satisfaction and/or school-level variables; thus, teachers in poor or rural schools have been shown to have lower levels of satisfaction than teachers in non-poor and suburban schools (Perie et al. 1997, Sargent and Hannum 2005). Therefore, contextual-level variables as well as teachers' demographic characteristics have a direct and indirect effect on teacher attendance.

Figure 1.1 summarises the information presented above on the different variables that could affect teacher attendance or teacher absenteeism in primary or secondary schools in developing countries.

Figure 1.1: Proposed model of teacher attendance in basic education in developing countries



1.3.2 Teacher attendance and student achievement

Although the focus of this review is on how to increase teacher attendance, in the long run the final outcome of interest should be student achievement and other outcomes of formal schooling. There have been some studies on the association between teacher attendance and achievement in developed countries. For instance, in a study with a US sample it was estimated that ten additional days of teacher absence could be linked to a decline of 3.2 percent of a standard deviation (SD) in mathematics achievement (Miller et al. 2008). Woods and Montango (1997) found a negative effect of teacher absenteeism on student reading achievement. On the other hand, Ehrenberg et al. (1991) did not find a relation between teacher absenteeism and student achievement.

There have also been some studies in developing countries. For example, Das et al. (2005) found that a 5 percent increase in teacher absence was linked with a 4 percent decline in achievement in English and mathematics in Zambia. The authors noted, however, that teacher absenteeism may have been for a variety of reasons,

such as the teachers being ill or not motivated, which would have different implications on their commitment to conduct high-quality lessons. Similarly, Suryadarma et al. (2006) found a negative correlation between teacher absenteeism and student achievement in mathematics, but not dictation, in Indonesia. As the authors warned, however, both absenteeism and achievement could be the result of other variables. In fact, to promote student achievement it is not only important that the teacher is present in the classroom but also that they are are effectively teaching and that their students are engaged in learning.

Thus the literature on what works to increase teacher attendance in developing countries is far from conclusive and has not been systematically reviewed. We turn to the objectives, methods and results of this review in the following sections.

1.4 Objectives

The purpose of this paper is to report on a systematic review of research on the effectiveness of interventions aimed at increasing teacher attendance in developing countries, as measured by the rate of teacher attendance. This question is posed only for interventions in primary and/or secondary education in developing countries. To define developing countries, we use the classification developed by the World Bank; this definition includes those countries with low-income, lower-middle-income or upper-middle-income economies, and excludes higher-income economies[3].

[3] Data retrieved from http://data.worldbank.org/about/country-classifications/country-and-lending-groups on 1 July 2010.

2. Methods used in the review

2.1 User involvement

For this review we sent emails to the corresponding authors of all included papers as well as to World Bank researchers working in the issue of teacher absenteeism, seeking their help to identify other relevant papers for the review and also (in some cases) to request additional information about the methods and results of their work. A few replied with suggestions on our work; however it proved to be much more difficult to get additional information to that in the papers (see details below).

DFID policy leads were also involved in reviewing and commenting on both the protocol and the final report and gave valuable feedback to improve this review.

2.2 Identifying and describing studies

2.2.1 Defining relevant studies: inclusion and exclusion criteria

We used the following inclusion criteria to identify potentially relevant primary studies:

i. *Scope*: studies that examined the impact of programmes aimed at increasing teacher attendance/reducing teacher absenteeism. The inclusion of a measure of teacher attendance in the study was mandatory.

ii. *Geographical location*: studies conducted in developing countries (according to the classification outlined above).

iii. *Population*: studies carried out with teachers in primary or secondary education institutions.

iv. *Study design*: quantitative studies using (a) experimental (randomized controlled trials [RCTs]) or (b) quasi-experimental designs (experiments with no random allocation to groups but adequate controls, e.g. instrumental variables, matching, and double and triple difference-in-difference studies). Studies which did not include some control for endogeneity of programme placement or self-selection into the programme were excluded. The inclusion of student outcomes was not a requirement for the study to be included.

v. *Date*: published from 1990 to July 2010, inclusive.

2.2.2 Identification of potential studies: search strategy

We consulted with an information specialist from the EPPI-Centre when developing our search strategy. Since we were only interested in quantitative primary studies that reported teacher attendance as an outcome, three key concepts were combined in the searches: teachers (population), intervention and attendance (outcome of the intervention). We did not include methodological filters for the retrieval of specific study designs. We considered it was best to retrieve a larger number of studies and then apply methodological filters as part of the inclusion/exclusion criteria. Table 2.1 provides further details on the specific search terms that were used.

Table 2.1: Concepts and search terms used in the review

Concept	Search terms
Population	teacher, staff, school[a]
Intervention	intervention, program, programme, incentives, impact, evaluation, effect, assessment
Outcome of the intervention	attendance, presence, absence, absenteeism, truancy, shirking

[a] School is included as a population term (instead of as an environment term). Preliminary searches have shown that several studies refer to 'school attendance' where the term school is used to refer to teachers and students.

The search for these terms was restricted to the title, abstract and keywords fields in the following databases: British Library for Development Studies (limited to the topic of Education), EconPapers, EconLit, EBSCO (searching: SocINDEX, Educational Research Complete, and Psychology and Behavioral Sciences Collection), ERIC, JSTOR (limited to the following databases: Economics, Education, Psychology, Public Administration, and Sociology), National Bureau of Economic Research (NBER), Oxford University Press Journals (limited to the subject of Social Sciences), Pro-Quest (limited to the following subjects: Economics, Education, Psychology, and Social Sciences), PsycINFO, RePEc/IDEAS, SAGE Journals Online (limited to the following topics: Education, Management and Organization studies, Psychology and Counseling, Public Administration, Research Methods and Evaluation, and Sociology), Science Direct (limited to the following subjects: Economics, Psychology, and Social Sciences), Sociological Abstracts, UNESDOC (UNESCO's documents and reports), and the World Bank Documents and Reports.

By searching the above databases, we were looking for potentially relevant journal articles, book chapters, working papers, conference proceedings and final project reports on the topic of interest. Additionally, we searched Google Scholar using the same terms since this search engine has the advantage of covering all disciplines and includes both published and unpublished materials. We chose Google Scholar over other citation indexes such as SSCI (Social Sciences Citation Index) because the former identified a higher number of studies.

As a general rule, the search was conducted in English since major databases, such as those mentioned above, include an English abstract even if the full text is published in another language. Only for Google Scholar, the World Bank Documents and Reports database, and UNESDOC did we repeat the search with equivalent terms in Spanish, French and Portuguese, in an attempt to capture additional literature from Latin America and Africa. As the Google searches generated a large number of results which were ordered by relevance, we limited our reviews to the first 250 results in each language in which the search was conducted.

Besides searching the above-mentioned databases, we also searched the website of the Abdul Latif Jameel Poverty Action Lab and contacted key researchers[4] working in the education field and asked them to help us identify other papers or relevant programmes that we should include in the review.

Finally, we used back-referencing as a strategy to identify relevant primary studies. We scanned the reference lists of included articles looking for further relevant material. We also conducted a handsearch of the following journals:

[4] As indicated in section 2.1, we sent emails to the corresponding authors of all included papers and as well as to World Bank researchers working on the issue of teacher absenteeism.

Comparative and Education Review, *Compare*, *International Journal of Educational Management* and *Journal of Educational Administration*.

We excluded dissertations from the body of primary studies considered for the review since these are not generally available online and obtaining them from their authors is very time consuming. It should be noted, however, that the studies in those dissertations that had been later published in a book or an article were included during our search of primary studies in journals and databases[5].

2.2.3 Characterising included studies

Following the EPPI-Centre guidelines, we developed a coding tool to identify, extract and code information about the primary studies for the systematic review. Codes covered both the intervention's objectives and design, and the programme evaluation design and results.

In addition, to determine the effectiveness of interventions to reduce teacher absenteeism, the coding tool captured additional information that could help in explaining the results, paying particular attention to any data on the causal chain and how interventions unfolded in practice. Explaining why different interventions work (or not), involves examining both the programme mechanisms at work and the context in which interventions were carried out. To achieve this, we provide information on how the intervention was implemented as well as relevant context variables (e.g. place of residence, ethnicity background, poverty, etc.) which may indicate whether an intervention is more effective among certain groups.

The coding tool is included in Appendix 2.1 of this report.

2.3 Methods for synthesis

2.3.1 Assessing quality of studies: critical appraisal

In order to assess the methodological quality of primary studies considered for this systematic review, we followed the principles outlined by Slavin's (2008) best evidence synthesis approach. According to Slavin (2008), when synthesising educational programme evaluation it is necessary to pay attention to certain key issues such as research design, sample size, adjustments for pre-test differences, duration of interventions, and use of unbiased outcome measures.

Based on Slavin's (2008) suggestions on programme evaluation syntheses, we developed a critical appraisal tool to classify studies as high, medium or poor quality. According to Slavin, the following types of study should be preferred for a systematic review (high quality):

- Randomised designs with analysis at the unit of assignment.
- Large, well-controlled matched designs. Among them, prospective studies should be strongly preferred to retrospective comparisons.
- In terms of sample size, larger studies should be preferred. Small studies can have highly variable effects and are more vulnerable to publication bias (small studies with zero or negative effects are less likely to be published or reported in any form than are larger studies with zero or negative effects).

There are other study designs that, although not ideal, can still be considered for a review with the caveat that certain issues need to be considered. These studies should be classified as medium quality:

[5] Appendix 3.1 provides more detailed information on the search results.

- Cluster randomised designs that are not large enough for hierarchical linear modelling. They contribute unbiased information to the extent that effect sizes can be adequately estimated; however, the estimation of standard errors tends to be biased.
- Randomised experiments without pre-tests can be included as long as attrition is low and equal between experimental and control groups.
- In terms of sample size, larger studies are preferred. However, random assignment studies tend to have small sample sizes. In such cases, smaller studies may not necessarily be excluded but the problem can be reduced by weighting for sample size.

Finally, there are studies that should be excluded from a systematic review because of their low quality. Among these are:

- Matched studies in which pretest differences are more than 50 percent of an SD, and
- Studies reporting the outcomes of programmes of less than 12 weeks in duration.

Critical appraisal questions are included in the last part of the coding tool which can be found in Appendix 2.1 of this report.

2.3.2 Overall approach to and process of synthesis

We began by conducting a narrative analysis of causal chain information contained in the individual studies with the purpose of explaining how interventions unfolded and, more specifically, what were the key mechanisms in explaining why interventions succeeded.

In order to combine the results from studies that use different measures of the same constructs, the results of the original studies have to be converted to a common metric (Glass et al. 1981, Littell et al. 2008). For this particular systematic review, we used standardised mean differences as effect sizes to compare studies. An effect size indicates the strength of the association between two or more variables[6]. Specifically in this paper, the effect size is the adjusted mean difference on teacher attendance/absenteeism between treatment and control groups, i.e. the difference between groups once the effect of different factors that could be confounders on the size of the programme effect are held constant.

We used the technique described by Nakagawa and Cuthill (2007) to calculate the adjusted mean difference. This technique uses both the t-statistic from a multivariate analysis and the sample sizes from each group (treatment and control) to get the effect size. After obtaining the effect size for each study, we used Hedges and Olkins (1985) bias correction method for small samples. Thus, for a primary study to be included in the statistical synthesis, all the relevant information to calculate the effect size had to be available (i.e. the regression coefficient for the variable of concern, its standard error, and the sample size for each study group). In those cases where more than one effect size per study was available, we followed the methodology suggested by Hedges et al. (1989) and

[6] According to the literature there are different effects sizes such as correlation, odds ratio, risk ratio, standardized mean differences, among others. More details about the different effect sizes can be found in Dunst et al. (2004).

calculated a weighted average effect size[7] for independent samples and a simple mean average for effect sizes from the same sample. Then, we proceeded to map each effect size through forest plots in order to compare the effect sizes across studies. We did not pool the effect sizes within each type of intervention (direct and indirect) because the studies were not strictly comparable (as explained in section 3.2 of this report) and the sample size per type of intervention was low (the maximum number of studies per type was two).

[7] The formula used to calculate the weighted independent effect sizes is $ES_{ws} = \Sigma (ES_i/SE_i)/(\Sigma(1/ES_i)$, taken from Hedges et al. (1989).

3. Search results

3.1 Studies included from searching and screening

The searches returned 18,524 papers, most of them coming from database searches although we also received suggestions of potentially relevant papers from expert researchers contacted. All records of research identified were uploaded to EPPI-Reviewer 4.0 and screened for duplicate records. We first removed duplicates (6,365) and re-counted all unique papers identified in the search (12,159). Then three researchers systematically reviewed those papers, excluding the majority of them after reviewing titles and abstracts. Before starting the screening process, the three researchers passed through a moderation phase where each member screened the same citations (a sample of the total studies) independently and then compared their differences in judgements, and discussed them and reconciled them until it was clear they were all applying the criteria in the same way.

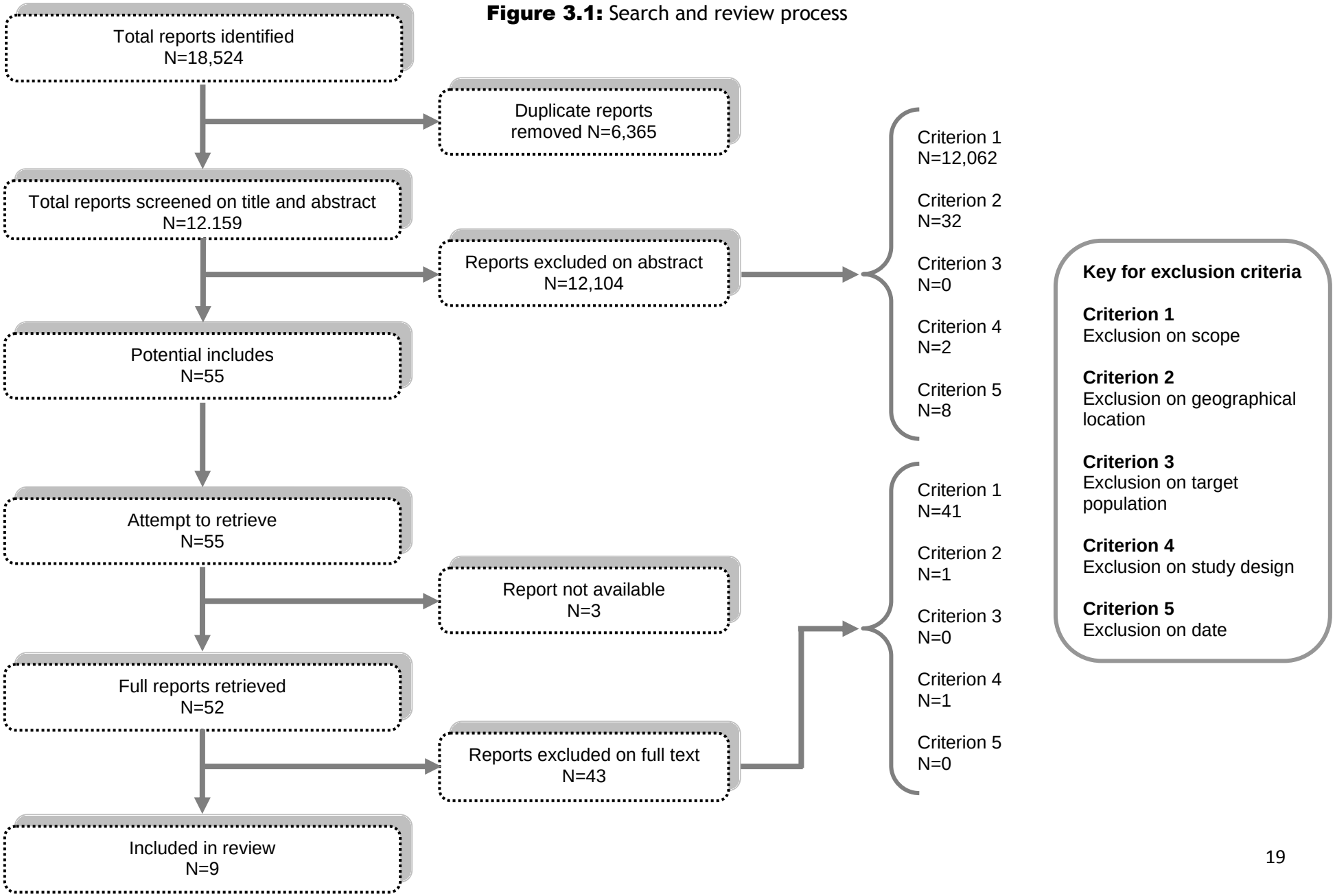
As a result, 55 papers were identified as potentially relevant and the full text copies were obtained and uploaded to EPPI-Reviewer 4.0 (there were three full text copies that could not be retrieved). These papers were reviewed; nine papers met the inclusion criteria and were included in the review. All papers identified for inclusion were in English, with the exception of one in Spanish (Cueto et al. 2008). Figure 3.1 provides a detailed outline of the search strategy and review process. The count of all papers identified in the search by database of origin is provided in Appendix 3.1. The list of papers excluded after reviewing full text can be found in Appendix 3.2.

All included studies measured the effect of a certain intervention on teacher attendance. Two of the studies (Cueto et al., 2008, Duflo and Hanna 2005) reported the effects of direct programmes and the remaining seven reported the effects of indirect programmes (Banerjee et al. 2008, Duflo et al. 2008, Glewwe et al. 2010, Jimenez and Sawada 1998, Kremer et al. 2009, Muralidharan and Sundararaman 2009, Nguyen and Lassibille 2008).

In terms of geographical location, four of the reported interventions were conducted in Africa (one in Madagascar and three in Kenya), three in Asia (all of them in India), and two in Latin America (Peru and El Salvador). It is interesting to note that all of the reported interventions, both direct and indirect, were implemented in rural areas, which seems sensible given that school attendance is usually lower there than in urban areas (Chaudhury et al. 2006).

Seven studies were classified as high quality according to our critical appraisal tool and two as medium quality.

Figure 3.1: Search and review process



3.2 Details of included studies

As described above, our systematic search led us to identify only nine studies meeting the inclusion criteria. Those nine studies can be organised into two categories: (i) direct interventions, where the main goal was to reduce teacher absenteeism, and (ii) indirect interventions, where reducing teacher absenteeism was an intermediate objective or a mechanism to reach the ultimate goal of improving student achievement. In what follows, we provide further information on the nine interventions (including information on their impact theory) and their effectiveness.

3.2.1. Direct interventions

These programmes attempt to raise teacher attendance through external monitoring and incentives. However, there might be differences between programmes in terms of the type of incentives and monitoring systems used. Incentives or rewards could be eitherpecuniary (e.g. percentage of the salary) or non-pecuniary (e.g. improvement of school facilities or educational material); and could be delivered on an individual or a group basis (or a combination of both). The monitoring system could be the responsibility of different actors, such as the school principal, external agents and community members.

Direct programmes simultaneously tackle variables affecting school attendance at both the teacher and the school level. In the former case, this is done by providing incentives/rewards to teachers in order to improve their satisfaction (with their salary in particular), and in the latter case by creating or strengthening a monitoring system within the school.

According to the literature, direct programmes providing input-based incentives may be found to be effective when detailed planning of their design and implementation, and more specifically monitoring, is considered. Nevertheless, a programme that rewards teacher attendance, but nothing else (i.e. what they do in school or in classes), may not result in changes in other intended outcomes (e.g. student achievement).

Two of the seven included papers reported the effect of programmes specifically aimed at improving teacher attendance (Cueto et al. 2008, Duflo and Hanna 2005). Both of them combined a monitoring system with the delivery of monetary incentives to teachers. Duflo and Hanna (2005) reported on the effects of a programme in India that used cameras with tamper-proof date and time functions to monitor daily teacher absence. A student in the class used the camera to take a picture of the teacher and the other students at the start and end of each schoolday. Each schoolteacher was paid based on the number of schooldays for which they were actually present at the beginning and end of the day (there had to be a minimum of a five-hour separation between the two moments, and a minimum number of children present). Cueto et al. (2008) reported on the effects of a monitoring programme in Peru, but in this case attendance checks were carried out by trained local monitors (usually parents). This programme also provided monetary incentives to teachers, but unlike the programme in India where incentives were delivered on an individual basis (Duflo and Hanna 2005), in the Peruvian programme incentives were delivered on both an individual and a group basis. Teachers received a bonus based on their own attendance, and could receive an extra bonus if at least 80 percent of their fellow schoolteachers also achieved the individual goal.

Figure 3.2 shows the causal chain of this type of intervention. As shown, the introduction of the incentive is expected to raise teacher attendance. This in turn

would increase teaching time within the classroom which would eventually lead to improved student achievement. The figure shows the theory of impact of an 'ideal' teacher incentive programme; however, not all direct interventions would necessarily contemplate all the steps shown in the figure.

The respective impact evaluations show both programmes were successful in improving teacher attendance. Using a randomised design, Duflo and Hanna (2005) found that the programme cut teacher absence: 42 percent of teachers were absent in comparison schools and 22 percent of teachers were absent in treatment schools. Using a matched design, Cueto et al. (2008) found that the programme improved teacher attendance in treatment schools by 17 days in a year compared to comparison schools.

One interesting feature of the Peruvian programme is that the monitoring system was implemented in both the treatment and comparison schools, with the only difference being that incentives were offered only in the former. The comparison was between monitoring alone versus monitoring plus incentives (i.e. no control group of schools with no monitoring was included). Thus, the impact of monitoring by itself cannot be assessed with this design. Duflo and Hanna's (2005) study, on the other hand, evaluated the effectiveness of incentives paired with monitoring compared to no incentives or monitoring.

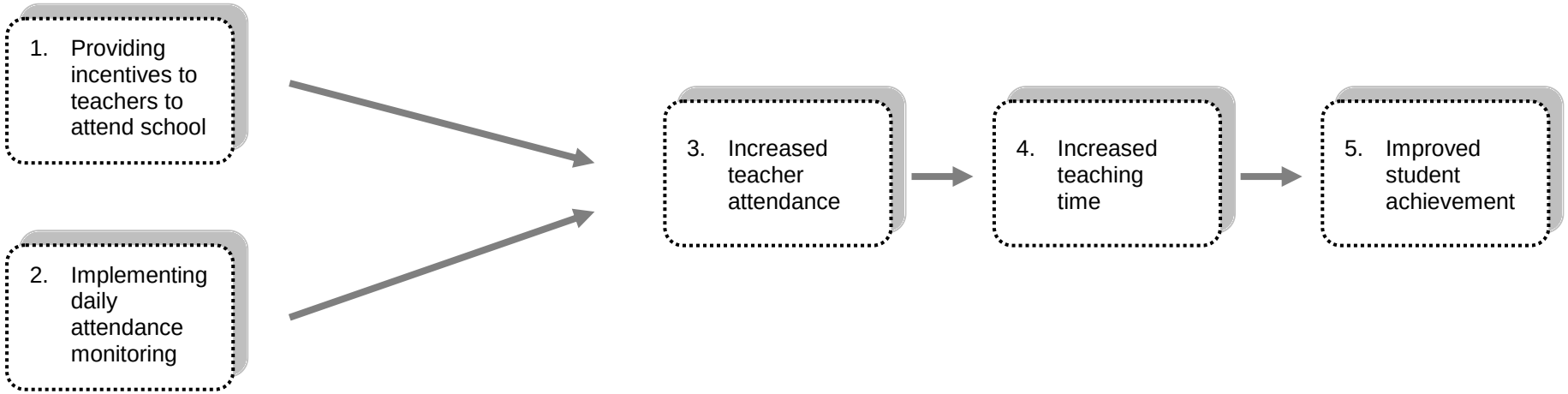
Finally, the impact evaluations showed that both programmes managed to improve student learning to a certain extent. Duflo and Hanna (2005) found test scores in programme schools were 0.17 SDs higher than in comparison schools after one year (mid-test); however, differences were not statistically significant at the end of the programme (post-test). Cueto et al. (2008) also found positive effects on test scores but not in all of the grades assessed (the effects were positive for fifth grade in mathematics).

3.2.2. Indirect interventions

In these programmes, the ultimate goal is not to raise teacher attendance per se, but it is expected that teacher attendance will increase through different mechanisms as a result of the programme. Based on those different mechanisms, indirect programmes can be further divided into four types: (i) programmes aimed at increasing parental and community participation, hoping this will raise teacher attendance; (ii) programmes providing incentives to teachers for increases in student achievement (output-based incentive programmes); (iii) programmes offering scholarships for students, hoping they (and their parents) will demand teacher attendance at school; and (iv) programmes tracking students by prior achievement, hoping that the homogenous composition of the class will have an effect on teacher effort (including attendance).

Seven of the nine reviewed studies assessed the effect of indirect programmes on teacher attendance: three assessed the effectiveness of interventions aimed at increasing parental and community participation, two assessed the effects of programmes providing incentives to teachers for student achievement, one assessed the effectiveness of a student scholarship programme, and the last one provided evidence on the impact of a tracking programme. Although these interventions are not directly aimed at improving teacher attendance, they all consider it as part of their theory of change.

Figure 3.2: Impact theory of direct programmes



Authors' own elaboration based on Duflo and Hanna (2005) and Cueto et al. (2008).

3.2.2.1 Programmes aimed at increasing parental and community participation

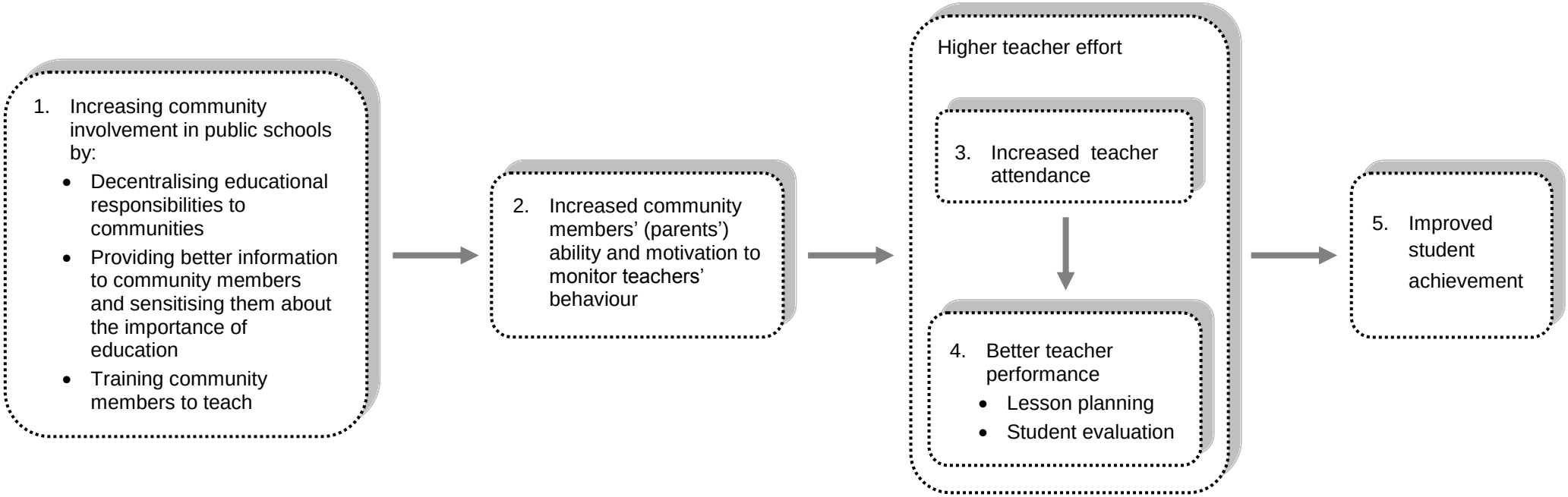
These interventions are considered indirect because reducing teacher absenteeism is an intermediate objective and not the ultimate goal of the programme. There is evidence from Central America indicating that programmes aimed at increasing parental and community participation through the devolution of decision-making authority to the schools has led to making teachers more accountable to their communities and, hence, helped to reduce teacher absenteeism (Vegas 2007).

Three of the included studies reviewed the effectiveness of this type of intervention: Jimenez and Sawada (1998), Nguyen and Lassibille (2008) and Banerjee et al. (2008). In Jimenez and Sawada's (1998) study, the intervention was implemented in El Salvador with the goal of decentralising education and expanding the coverage of rural education by strengthening direct involvement and participation of parents and community groups who were responsible for 'contracting and removing teachers by closely monitoring teacher's performance, and for equipping and maintaining the schools' (Jimenez and Sawada 1998: 2). The intervention evaluated by Nguyen and Lassibille (2008) was implemented in Madagascar with the intention of improving supervision of schools by providing tools and school information to higher-level bureaucrats (top-down policy), alone or paired with a school-level intervention aimed at mobilising parents to elaborate an action plan aimed at improving students' performance. Finally, in Banerjee et al.'s (2008) study, the intervention was implemented in India with the aim of sensitising people about the importance of education for their children and the state of education in the village, hoping this would encourage them to act either in their private capacity or as part of a group. Some training to make them more effective in this capacity was provided as part of this intervention. Table 3.1 provides further information on the intervention design, detailing the characteristics of both treatment and control groups in each of the studies.

The impact theory behind this type of programme is that increasing community involvement in public schools will increase community members' (especially parents') ability and motivation to monitor teacher behaviour, which in turn will promote greater teacher effort (including both higher attendance and better performance) which will ultimately lead to improved achievement. In these programmes, there are different ways to increase community involvement. This could be done by decentralising educational responsibilities to communities, providing better information to community members, and sensitising them about the importance of education and/or training them to teach children. Figure 3.3 shows the impact theory of this type of programme. It should be noted that the figure represents the theory of impact of an 'ideal' community participation programme; however, not all interventions would necessarily contemplate all the steps shown in the figure.

Two interventions, Nguyen and Lassibille (2008) and Banerjee et al. (2008), were evaluated using an RCT, while Jimenez and Sawada (1998) used a quasi-experimental design (Heckman two-step method) to assess the impact of EDUCO (Education con Participacion de la Comunidad) in El Salvador. Only one of the interventions found a positive effect on teacher attendance (Jimenez and Sawada, 1998). Only one study, Banerjee et al. (2008), found a positive impact on student achievement; moreover, this was only for one treatment group where in addition to providing parents with information about education in the village, the programme trained them on how to teach their children to read.

Figure 3.3: Impact theory of programmes increasing parental and community participation



Programme assumptions

- Programme is expected to affect teachers' behaviour if the community members (parents) register the information provided, believe they can exercise control power, and successfully coordinate action plans

Authors' own elaboration based on Jimenez and Sawada (1998), Banerjee et al. (2008) and Nguyen and Lassibile (2008).

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3.2.2.2 Programmes providing incentives to teachers for increases in student achievement (output-based incentive programmes)

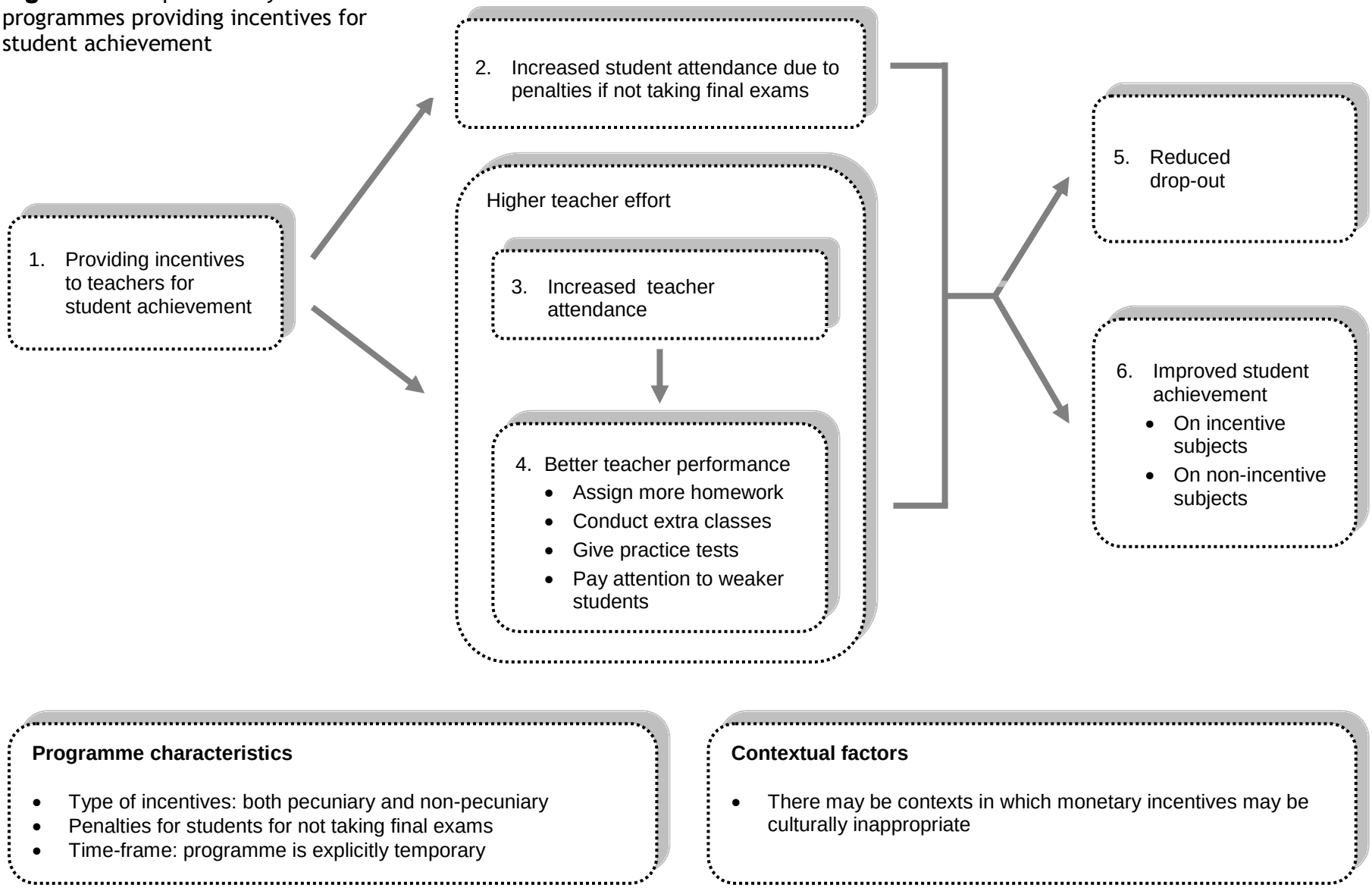
This type of programme is aimed at increasing teacher attendance through rewarding outputs, generally student achievement. Hence, they may have an effect on other inputs besides teacher attendance, such as improving pedagogy or giving more homework to students.

Two of the included studies reported the effect of this type of intervention. Muralidharan and Sundararaman (2009) reported the effects of an intervention in India and Glewwe et al. (2010) assessed the impact of an intervention in Kenya. In both cases, the programme provided incentives to teachers on the basis of improvement in test scores of the students. However, in the Indian study the incentives were monetary and delivered on both an individual and group basis, while in Kenya the incentives were non-monetary and provided on a group basis.

One interesting feature of both interventions is that the incentive was provided on the basis of the average improvement in test scores of all the students, implementing penalties for students (included in the baseline) not taking the final exams. Therefore, besides increasing student attendance and achievement, the programme is also expected to reduce drop-out.

Figure 3.4 shows the impact theory of this type of intervention. It is expected that providing incentives to teachers for student achievement will increase student attendance and boost teacher effort (increasing teacher attendance and improving teacher performance). These in turn will lead to improved student achievement and reduced drop-out (given the penalties for students not taking the exams).

Figure 3.4: Impact theory of programmes providing incentives for student achievement



Authors' own elaboration based on Muralidharan and Sandararaman (2009) and Glewwe et al. (2010).

Both interventions were evaluated using an RCT to assess impact. Neither of the interventions had an effect on teacher attendance. However, for both interventions, the authors reported some gains in test scores as a result of the programme. In Muralidharan and Sandararaman's (2009) study, the evaluation found positive effects on student learning (mean treatment effect = 0.22 SD). In a similar way, Glewwe et al. (2010) found test scores increased only in the exams linked to the incentives (0.22 SD higher in the treatment group).

3.2.2.3 Programmes offering incentives scholarships for students

This type of programme attempts to reduce teacher absenteeism by offering scholarships for students. The study by Kremer et al. (2009) reported on the impact of a programme providing merit scholarships for girls in Kenya, and since the scholarship depended on how much they learned, it was expected that both students and their parents would demand teacher attendance at school.

Figure 3.5 shows the impact theory of this programme. According to this, it is expected that providing merit scholarships for primary school students will increase teacher attendance since parental monitoring would be greater: there is anecdotal evidence reported by teachers that parents began to ask teachers to work harder to enable their daughters to win scholarships for succeeding years, and visited the school more often to check up on teachers and encourage students to put in more effort. Student attendance will also be increased, which in turn will increase student motivation and effort and will ultimately lead to improved student achievement.

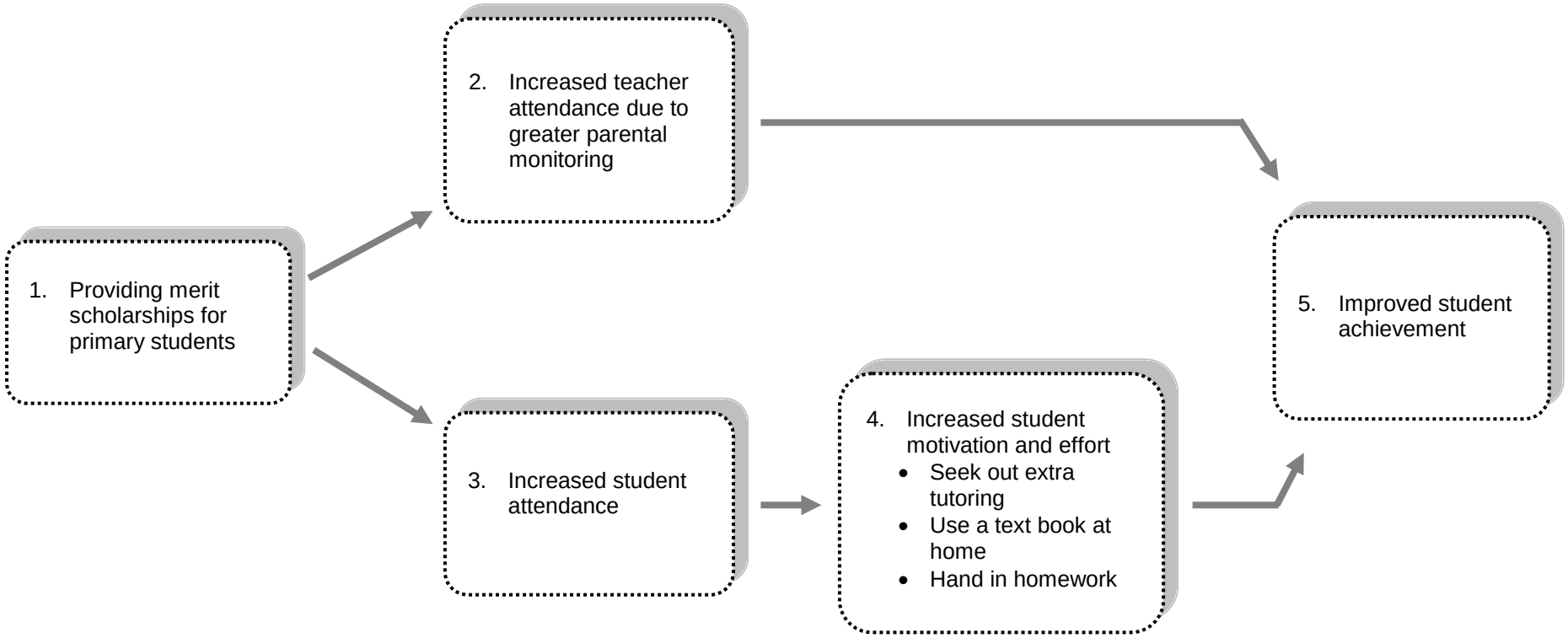
The intervention was evaluated using an RCT. Results showed a treatment effect on girls' achievement in the intention to treat (ITT) (0.19 SD, $p<0.10$) and restricted (0.15 SD, $p<0.05$) samples. However, no treatment effect on girls' achievement was found in the longitudinal sample (0.12 SD, $p>0.10$). Additionally, the programme managed to increase teacher attendance by 5 percent ($p<0.01$) and had positive treatment effects on academic performance for boys in the longitudinal sample (0.14 SD, $p<0.05$).

3.2.2.4 Programmes tracking students by achievement

This type of programme assigns students of the same grade into separate classes based on prior achievement (i.e. tracks them), hoping that the homogenous composition of the resulting classes will have an effect on teacher effort (including attendance). Duflo et al. (2008) reported the effects of a tracking programme in Kenya. The programme was implemented in the context of a class-size reduction experiment in Western Province that allowed schools to add an additional section in first grade. In the schools of the treatment group, children were assigned to one of two sections based on scores in exams previously administered by the school that year, making class composition more homogeneous, with a class of high achievers and a class of lower achievers.

Figure 3.6 shows the impact theory of this type of interventions. According to this, it is expected that tracking students by prior achievement will lead to greater student effort (since students will have peers who are similar to them in academic level) and greater teacher effort which will in turn lead to improved student achievement. The homogenous composition of the class will help teachers adjust their teaching to fit their class's composition. According to the intervention model, the effect of tracking on teacher effort is not only direct but also indirect through student effort.

Figure 3.5: Impact theory of programmes offering scholarships for students



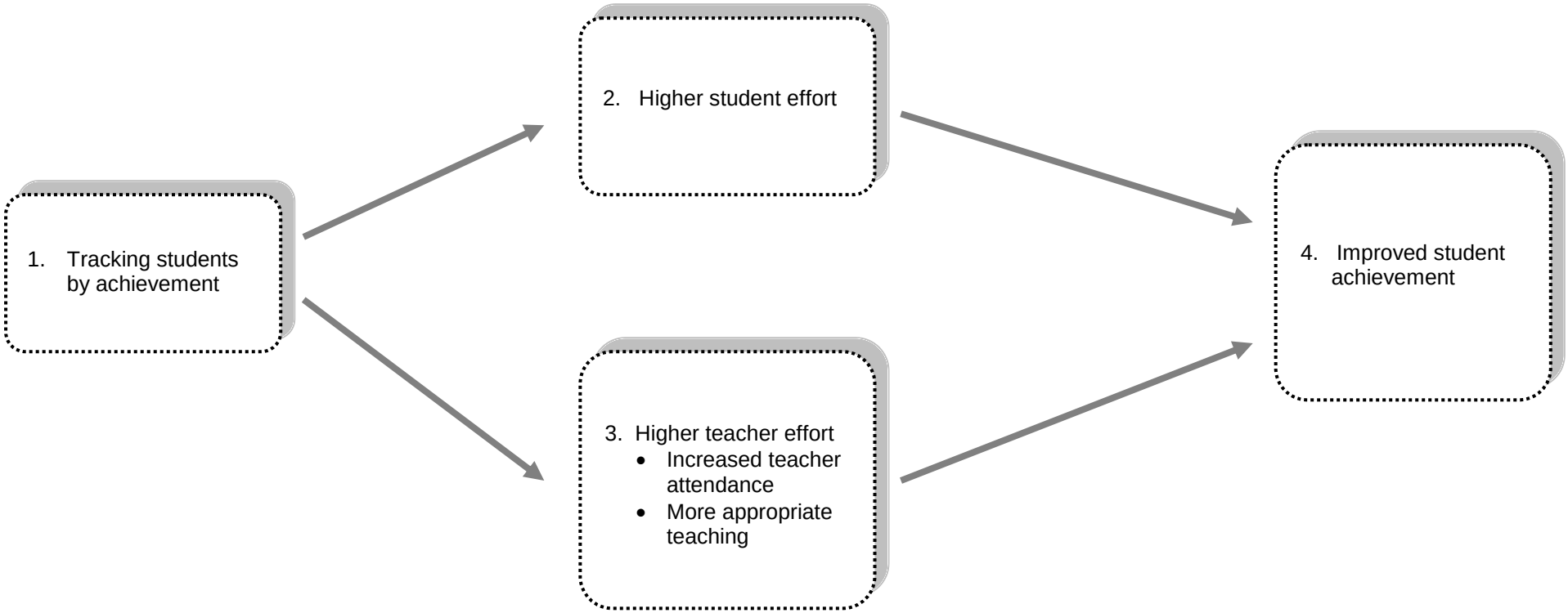
Authors' own elaboration based on Kremer et al. (2009).

The intervention was evaluated using an RCT. Results showed that tracking students raised scores for all students, even those assigned to the lower-achieving section. According to Duflo et al. (2008), test scores were on average 0.14 SDs higher in tracking schools than in non-tracking schools after 18 months of intervention (and 0.18 SDs higher after controlling for baseline scores and other control variables). Moreover, one year after the programme ended, students in tracking schools performed 0.16 SDs higher than those in non-tracking schools.

The evaluation also provided evidence that teacher behaviour was affected by tracking. Teachers in tracking schools were 4.1 percentage points more likely to be found in school. Additionally, there was evidence that teachers were tailoring instruction to class composition since students in the lower half of the initial distribution gained comparatively more from tracking in the most basic skills, while students in the top half of the initial distribution gained more from tracking in somewhat more advanced skills (Duflo et al. 2008).

To conclude this section on characteristics of the nine studies included in this systematic review, Table 3.1 summarises the PICO (population, intervention, comparator and outcome) information of all of them, including a description of each intervention as well as information on its evaluation design (describing both treatment and control groups).

Figure 3.6: Impact theory of tracking programmes



Authors' own elaboration based on Duflo et al. (2008).

Table 3.1: Direct and indirect programmes promoting teacher attendance in developing countries

Direct programmes								
Study	Country	Study quality	Population (sample size[a])	Intervention	Comparators (study design)	Outcomes (significant effects)	Context	Scale
Duflo and Hanna (2005)	India	High	120 primary schools, 60 in each group (treatment and control).	Monitoring teacher attendance using cameras. Monetary incentives provided on an individual basis.	RCT *Treatment group*: received external monitoring programme (each teacher received a camera and instructions for one of the students to take a photograph of the teacher and the other students at start and end of each schoolday) and monetary incentives (each teacher received a bonus for each additional day they attended and a fine for each day they did not attend work). *Comparison group*: did not receive monitoring programme or monetary bonus.	*Teacher attendance:* programme made teacher absence lower in treatment schools (22%) than in comparison schools (42%). *Student achievement:* test scores in programme schools were 0.17 SD higher than in comparison schools after 1 year (mid-test). Differences were not statistically significant at the end of the programme (post-test).	Rural areas	Intervention covered only 1 district (or some villages within a district)
Cueto et al. 2008	Peru	Medium	178 primary schools (166 in treatment and 12 in comparison groups).	Monitoring teacher attendance by trained monitors (parents). Monetary incentives provided on both an individual and group basis.	Quasi-experimental (matched design) Treatment group: received daily monitoring of teacher attendance (3 times per day), and monetary incentives (each teacher received a bonus for achieving individual and group attendance goals). Comparison group: received daily monitoring of teacher attendance (3 times per day).	*Teacher attendance*: programme improved teacher attendance in treatment group in 17 days in a year compared to comparison group. *Student achievement*: positive effect on test scores only in mathematics in 5th grade.	Rural areas	Intervention covered several districts but not a national programme

Indirect programmes: increasing parental and community participation								
Study	Country	Study quality	Population (sample size[a])	Intervention	Comparators (study design)	Outcomes (significant effects)	Context	Scale
Jimenez and Sawada 1998	El Salvador	Medium	192 primary schools (38 in treatment and 154 in comparison groups).	Decentralising education and expanding rural coverage by strengthening direct involvement and participation of parents and community groups.	Quasi-experimental (Heckman two-step method) *Treatment group*: schools managed autonomously by an elected Community Education Association (group of parents) that was in charge of the administration and management of the school (they were responsible for contracting and removing teachers, monitoring their performance, and equipping and maintaining schools). *Comparison group*: Traditional schools run by the Ministry of Education.	*Teacher and student attendance*: programme reduced student absences due to teacher absences in 0.26 SD. *Student achievement*: no treatment effect on student scores. *Educational coverage*: programme was remarkably successful in expanding educational coverage in rural areas.	Rural areas	National-level programme.
Nguyen and Lassibille 2008	Madagascar	High	1,212 primary schools (303 in comparison group and 303 in each of the 3 treatment groups).	Improving supervision of schools by providing tools and school information to higher-level bureaucrats (top-down policy), alone or paired with a school-level intervention aimed at mobilising parents.	RCT *Treatment group 1*: schools with district administrator-level intervention. *Treatment group 2*: schools with district administrator- level and subdistrict head- level intervention. *Treatment group 3*: schools with district administrator- level, subdistrict head- level and school-level intervention (promoting parents' active participation). *Comparison group*: did not receive any intervention.	*Teacher attendance and practices*: top-down policy design was not effective in improving teaching practices and learning outcomes in treatment groups. Interventions down to the school level improved some teaching practices but did not improve teacher attendance. *Student achievement*: test scores improved by 0.10 SD after 2 years only when comparing different treatment groups. There were no statistically significant differences between control and treatment groups.	Rural areas	Intervention covered several districts but not a national programme

Study	Country	Study quality	Population (sample size[a])	Intervention	Comparators (study design)	Outcomes (significant effects)	Context	Scale
Banerjee et al. 2008	India	High	280 villages (65 in each of the 3 treatment groups and 85 in the comparison group).	Sensitising people about the importance of education for their children and the state of education in the village, hoping this would encourage them to act either in their private capacity or as part of a group. Some training that would make them more effective in this capacity was provided as part of the intervention.	RCT *Treatment group 1*: group meetings held aimed at sharing relevant information about norms and provisions for schools and describing the role and activities of Village Education Committees. *Treatment group 2*: group meetings held involving same topics as Treatment group 1, plus sensitising community members and parents on the status of their children's learning by participating/observing how their children were being assessed in reading or arithmetic. *Treatment group 3*: group meetings held involving same topics as Treatment group 2, plus a demonstration class on how to improve their children's reading skills. People interested were given special training and materials to enable them to work with children in their villages. *Comparison group*: did not receive any intervention.	*Teacher attendance*: interventions had no impact on teacher attendance. *Student achievement*: intervention that trained volunteers to teach children to read had a large impact on achievement. Children from treatment group 3 were 1.7 percent more likely to read at least letters ($p<0.05$); 1.8 percent more likely to read words or paragraphs ($p<0.05$), and 1.7 percent more likely to read stories ($p<0.10$).	Not clear	Intervention covered only 1 district (or some villages within a district)

Indirect Programmes: providing incentives to teachers for increases in student achievement (output-based incentives)								
Study	Country	Study quality	Population (sample size[a])	Intervention	Comparators (study design)	Outcomes (significant effects)	Context	Scale
Muralidharan and Sundararaman 2009	India	High	300 government-run primary schools (100 in the comparison group and 100 in each of the 2 treatment groups).	Improving school performance by providing monetary incentives to teachers on the basis of the average improvement in test scores of all their students. Monetary incentives were delivered on both an individual and group basis.	RCT *Treatment group 1*: teachers received the same bonus for achieving group goals (improvement of students' average school level in test scores). *Treatment group 2*: teachers received an individual bonus for achieving individual goals (improvement on average test scores of students taught by the specific teacher). *Comparison group*: teachers did not receive any monetary incentives.	*Teacher attendance*: no programme impact on teacher attendance. *Student achievement*: positive programme effects on student learning (mean treatment effect of 0.22 SD).	Rural areas	Intervention covered several districts but not a national programme
Glewwe et al. 2010	Kenya	High	100 schools, 50 in each group (treatment and comparison).	Providing incentives to teachers based on student test scores, with penalties for students not taking the exams. Incentives were non-monetary and provided on a group basis.	RCT *Treatment group*: teachers and headteachers received gifts if their students scored well in district exams (prizes were awarded based on average performance of students). *Comparison group*: teachers or headteachers did not receive any incentives.	*Teacher attendance*: no effect on teacher attendance. *Student achievement*: effect on achievement only in year 2 in the government exam (0.14 SD, $p<0.10$), and no effect on the NGO (non-gopvernmental organisation) exams.	Rural areas	Intervention covered several districts but not a national programme

Indirect Programmes: offering incentives scholarships for students								
Study	Country	Study quality	Population (sample size[a])	Intervention	Comparators (study design)	Outcomes (significant effects)	Context	Scale
Kremer et al. 2009	Kenya	High	127 primary schools (64 in treatment group and 63 in comparison group).	Increasing student attendance and increasing achievement by providing merit scholarships for girls.	RCT *Treatment group*: girls received merit scholarships. *Comparison group*: girls did not receive scholarships.	*Teacher attendance*: positive effect on teacher attendance (5%, $p<0.01$). *Student achievement*: treatment effect on girls' achievement in the ITT (0.19 SD, $p<0.10$) and restricted (0.15 SD, $p<0.05$) samples. No treatment effects on girls' achievement in the longitudinal sample (0.12 SD, $p>0.10$). No treatment effect on boys' achievement in the ITT (0.08 SD, $p>0.10$) and restricted samples (0.07 SD, $p>0.10$). Positive effects on boys' achievement in the longitudinal sample (0.14 SD, $p<0.05$).	Rural areas	Intervention covered several districts but not a national programme
Indirect Programmes: Tracking students by achievement								
Duflo et al. 2008	Kenya	High	121 schools (60 in treatment group and 61 in comparison group).	Increasing achievement by tracking students based on prior achievement.	RCT *Treatment group*: students were assigned to two sections based on scores in exams administered by the school (students in the lower half in one section and students in the upper half in other section). *Comparison group*: students were randomly assigned to one of two sections.	*Teacher attendance*: teachers in tracking schools were 4.1 percentage points more likely to be found in school. *Student achievement*: test scores were (on average) 0.14 SDs higher in tracking schools than in non-tracking schools after 18 months of intervention.	Not clear	Intervention covered several districts but not a national programme
[a]Sample size for the assessment, not for the whole programme.								

4. Synthesis results: Effectiveness of interventions

4.1 Why did some interventions work?

The aim of this section is to look at how and why interventions worked. This involves identifying causal pathways or key mechanisms that make a particular intervention successful. With this purpose in mind, we extracted from the original studies any information on the theory of impact and how interventions unfolded in practice.

4.1.1 Direct interventions

Direct interventions attempt to raise teacher attendance through external monitoring and incentives. Both Duflo and Hanna (2005), and Cueto et al. (2008) found positive and statistically significant effects of direct interventions on teacher attendance. According to both studies, coupling monitoring systems with rewards was an effective mechanism to reduce teacher absenteeism.

Besides raising teacher attendance, direct interventions also seemed effective in improving student achievement; however the effect was not as robust as the one observed for teacher attendance. Duflo and Hanna (2005) only found statistically significant differences in test scores in favour of the treatment group at the end of the first year (mid-test) but differences were not statistically significant at the end of the programme (post-test). Cueto et al. (2008) found positive effects on test scores only in mathematics in fifth grade.

These results suggest that a teacher in the classroom is an important but insufficient pre-requisite for improving achievement. In that regard, Cueto et al. (2008) emphasised that the relationship between teacher attendance and achievement may be non-linear, i.e. in the beginning, an increase in teacher attendance led to an increase in student achievement; however, there was a point at which higher teacher attendance no longer led to further improvements in student achievement. This would occur when teachers are not prepared or do not have the professional skills to develop class material further.

Consequently, the pedagogical processes taking place within the classroom seem crucial to explain students' achievement. However, the two included studies dealing with direct interventions did not provide information on how the extra time was used.

4.1.2 Indirect interventions

As previously indicated, the ultimate goal of indirect interventions is not to raise teacher attendance per se, but it is expected that teacher attendance will increase through different mechanisms as a result of the programme. Based on those different mechanisms, indirect programmes can be further classified into four types: (i) programmes aimed at increasing parental and community participation; (ii) programmes providing incentives to teachers for increases in student achievement (output-based incentive programmes); (iii) programmes offering incentives scholarships for students; and (iv) programmes tracking students by prior achievement.

4.1.2.1 Programmes aimed at increasing parental and community participation

Interventions aimed at increasing parental and community participation are generally based on the premise that increasing community involvement in public schools will increase community members' (especially parents') ability and motivation to monitor teacher behaviour, which in turn will promote greater teacher effort (including both higher attendance and better performance) which will ultimately lead to improved achievement.

Jimenez and Sawada (1998) was the only study of this type of intervention that found a positive and statistically significant effect on teacher attendance. The authors assessed the EDUCO programme in El Salvador. This programme sought to strengthen direct involvement and participation of parents and community groups, who started monitoring and supervising the schools. According to the authors, parents' direct involvement in monitoring teachers and schools was a key mechanism in an observed increase in teacher attendance.

After examining the results of each of the three included studies of this type, the main difference between the interventions was the degree of community involvement. While the interventions evaluated by Nguyen and Lassibille (2008) and Banerjee et al. (2008) tried to increase community involvement mainly by providing better information to parents and sensitising them about the importance of education, the intervention assessed by Jimenez and Sawada (1998) was more aggressive in boosting parents' participation and not only provided them with information but also gave them actual decision-making capacities and it was precisely this last aspect that made the difference.

Looking at student achievement, Banerjee et al. (2008) was the only study where a positive impact on student achievement was found. However, this was only for the treatment group where, in addition to providing parents with information about education in the village, the programme trained them to teach their children how to read.

In sum, the effectiveness of this type of intervention in improving both teacher attendance and student achievement seems to be explained by the degree of parents' involvement: the more empowered they are with both resources and decision-making capacities, the more likely it is to produce an effect. Just providing information to parents does not seem effective in boosting their participation and therefore improving school supervision.

4.1.2.2 Programmes providing incentives to teachers for increases in student achievement (output-based incentive programmes)

Two of the included studies reported the effect of this type of intervention. Muralidharan and Sundararaman (2009) reported the effects of an intervention in India and Glewwe et al. (2010) assessed the impact of an intervention in Kenya. In both cases, the programme provided incentives to teachers on the basis of improvement in test scores of the students.

Although both interventions succeeded in improving student achievement to a certain extent, the improvement was not because of an improvement in teacher attendance, suggesting the importance of other process variables in explaining learning gains. Both studies identified greater teacher effort as the key mechanism for achieving this result. In Glewwe et al.'s (2010) study, teachers in the treatment group were found to provide more prep sessions than control teachers. Muralidharan and Sandararaman (2009) found the incentives programme did not change teacher attendance but it probably made them exert more effort when present. According to these authors, teachers in the treatment group were 'significantly more likely to assign homework and class work, conduct extra classes beyond regular school hours, give practice tests, and pay special attention to weaker children' (Muralidharan and Sandararaman 2009: 25). These results suggest the need for this type of intervention to include a component aimed at improving teachers' tools and qualifications.

These findings are consistent with what has been proposed by numerous theories to explain quality in schools. Among the most prominent of these are the school effectiveness models (e.g. Scheerens 1990), which suggest that achievement (and other educational outcomes) are the result of inputs (such as teacher characteristics), educational processes in the classroom (such as pedagogical interactions), and the school (such as school discipline), occurring in a given context (for example in communities with

public services of high quality). There could be many relevant variables within each of these categories, but none of these by itself will guarantee educational quality. For example, here we are focusing on whether or not the teacher is in the classroom, but this may not predict achievement if, for example, the teacher is in the classroom but, due to poor discipline, students are not engaged; or discipline is maintained but the quality of the pedagogical interactions is too low for students to learn the material at a level that would be prescribed for their age and grade.

4.1.2.3 Programmes offering incentives scholarships for students

Only one of the nine included studies in this systematic review reported on the effectiveness of this type of indirect intervention. The study by Kremer et al. (2009) assessed the impact of a programme providing merit scholarships for girls in Kenya, and since the scholarship depends on how much they learn, it was expected that both students and their parents would demand teacher attendance at school.

According to their results, the programme managed to increase teacher attendance by 5 percent ($p<0.01$) and also had an effect on student achievement, although these results are not as robust as the ones for teacher attendance since they were only observed for certain subsamples and not for the longitudinal sample, as explained above (see Table 3.1).

Kremer et al. (2009) argued that several mechanisms could potentially have increased teacher effort in response to the merit scholarship programme, including gifts from winners' parents. However, while they could not rule out the existence of such mechanisms, they had anecdotal evidence that increased parental monitoring did play a role. According to the authors, teacher interviews suggested greater parental monitoring occurred in the district of Busia where, according to teachers, parents had begun to ask teachers to work hard to enable their daughters to win scholarships for successding years. Teachers also reported that parents visited the school more often to check up on teachers and to encourage the students to put in more effort.

The authors also pointed out there is little quantitative evidence that the program changed teacher behaviour beyond increasing attendance. According to them, programs students were no more likely than comparison students to report being called on by teacher in class during the last two days or to have done more homework (Kremer et al., 2009). However, it should be noticed that the study only collected data on the habits, inputs and attitudes of students and did not collect further data on how the pedagogical practices within the classroom may have changed.

4.1.2.4 Programmes tracking students by prior achievement

This type of programme tracks students by prior achievement, hoping that the homogenous composition of the class will have an effect on teacher effort (including attendance). More specifically, it is expected that tracking students by prior achievement will lead to greater student effort (since students will have peers who are academically 'closer' and therefore exert positive peer effects) and greater teacher effort which will in turn lead to improved student achievement. The homogenous composition of the class will help teachers to adjust their teaching to fit their class's composition.

Duflo et al. (2008) found that tracking students by prior achievement raised scores for all students, even those assigned to lower-achieving classes. According to their interpretation of this main finding, tracking benefits higher-achieving students because it implies academically-stronger peers and greater teacher effort, and benefits lower-achieving students because it implies a level of instruction that better matches their needs. Together, these results suggest that peers affect students both directly and indirectly by influencing teacher behaviour, particularly teacher effort (including teacher attendance) and choice of target teaching level.

4.1.3 A reflection on the use of teacher incentives

Several of the described interventions – either direct or indirect – offered incentives as part of their strategy to improve teacher attendance and/or student achievement. There are some aspects of this strategy that should be considered.

First, the incentive can be monetary or non-monetary. The latter is generally used in contexts in which monetary incentives may be culturally inappropriate (for instance, in Kenya, Glewwe et al. [2010] reported monetary incentives which were not adequate in that context). The evidence reviewed suggests that both types of incentive may work. The studies conducted by Muralidharan and Sundararaman (2009) and Glewwe et al. (2010) assessed the impact of output-based (student achievement) teacher incentives programmes. In the former case, the incentive offered was monetary; in the latter case, the incentive was non-pecuniary. Both studies found relatively large positive effects on student achievement.

A second issue regarding incentives is the delivery method. They can be delivered on an individual or a group basis. The study carried out by Muralidharan and Sundararaman (2009) provided evidence that both individual and group incentives performed equally well in the first year of intervention, but the former outperformed the latter in the second year.

A third aspect is that regardless of the type of incentive or the delivery method used, to be effective the incentive and the conditions for receiving it should be transparent to all the teachers. The studies reviewed (for instance, Duflo and Hanna 2005) showed that it is key that teachers fully understand the way in which incentives are calculated and the specific behaviours that are being rewarded. The importance of teachers understanding how an incentive programme works was also pointed out by Glewwe et al. (2010) when they stated: 'teachers took the programme more seriously after they had seen it work in year 1, and thus better understood the incentives' (Glewwe et al. 2010: 213).

A fourth issue around offering incentives in general (either input-based or output-based) is their potential pervasive effects. In principle, one would expect that an incentive should increase individual effort; however, some psychological theories argue that extrinsic rewards may interfere with intrinsic motivation, reducing effort in certain circumstances. Another and common concern about an incentive programme relates to multitasking and the potential for tricking the incentive system (Duflo and Hanna 2005, Kremer et al. 2009). Finally, one last concern specifically related to output-based incentive programmes is the potential risk of teachers teaching to the test, targeting narrower skills that only raise test scores instead of investing their effort in boosting long-term learning (Glewwe et al. 2008).

In general terms, the studies included in this review found no evidence of cheating or gaming the system among teachers in treatment schools. On the contrary, some studies reported positive spill-overs from the introduction of incentives (for instance, Kremer et al. [2009] and Muralidharan and Sandararaman [2009]). The only negative aspect of incentives was reported by Glewwe et al. (2010), who found little persistence of programme impact on test scores after the programme ended and the incentive was withdrawn. In relation to this, Glewwe et al. (2010) pointed out that the programme was explicitly temporary and an alternative incentive design could have had a more favourable impact: 'A permanent programme might have led teachers to invest in boosting long-run learning' (Glewwe et al. 2010: 224).

4.2 Effect sizes per study

In previous sections we described the effectiveness of the interventions and their causal mechanisms based on the information provided by the original primary studies. This

section reports the average effect sizes for the impact of direct and indirect interventions on teacher attendance within studies.

Additionally and as previously indicated, in this paper we intended to shed some light on the relationship between teacher attendance and student achievement by coding and analysing whether or not programmes aimed at increasing attendance also increased student achievement. Therefore, the effect sizes of this type of intervention on student achievement are reported in this section.

The systematic search yielded nine original studies assessing the impact of a given (educational) intervention on teacher absenteeism. However, only six of them had the statistical information required to be included in the statistical synthesis (i.e. t-statistic and sample size for treatment and contrast group). The studies by Banerjee et al. (2008), Duflo et al. (2008) and Muralidharan and Sundararaman (2009) were not considered for the statistical synthesis since information about the sample size for treatment and contrast groups was not available in the published paper nor could it be obtained from the authors.

All the included studies reported more than one effect size for teacher attendance and student achievement as they used different outcomes, different sources of data, different methods to calculate the effect, and different points in time to assess the effect of the educational programmes on these outcomes. The total number of effect sizes available in the six studies included in the statistical synthesis is 33 for attendance and 70 for student achievement (see summary table in Appendix 4.1).

We calculated an average effect size per original study. In order to do this, we first selected the relevant effect sizes within each study according to the following criteria: (i) when effect sizes were reported for different years, we considered the effect for the last year available; (ii) when effect sizes were reported for subsamples as well as for the full sample, we considered the effect sizes for the full sample; and (iii) when the effect sizes for the differences over time (growth) in the outcome variable were available, we considered them instead of the reported effect size for a given point in time. After following this procedure, the total number of effect sizes selected from the six studies drops to 11 on teacher attendance/absence and 24 on student achievement, as shown in Table 4.1.

Table 4.1: Relevant effect sizes per study by type of outcome

Study	Country	Author	Type of intervention	Quality of the study	Number of effect sizes	
					Absenteeism/ attendance (N=11)	Achievement (N=24)
1	India	Duflo and Hanna 2005	Direct	High	1	2
2	Peru	Cueto et al. 2008	Direct	Medium	3	6
3	El Salvador	Jimenez and Sawada 1998	Indirect	Medium	1	2
4	Madagascar	Nguyen and Lassibille 2008	Indirect	High	3	6
5	Kenya	Glewwe et al. 2010	Indirect	High	2	2
6	Kenya	Kremer et al. 2009	Indirect	High	1	6

Given that some of the included studies had more than one effect size per relevant outcome, we used the following criteria to combine them and get one average effect size per relevant outcome per study: (i) when the effect size was reported for different subsamples (e.g. females and males, different school grades, or different treatment groups) instead of reporting it for the total sample, we calculated a weighted effect size using the respective standard errors as a weight for each effect size; (ii) when the effect

sizes reported in the original studies were for the same sample but for different outcomes (e.g. achievement in mathematics and reading or teacher attendance measured in more than one way), we calculated the simple mean average of the effect sizes. We followed this procedure to calculate the effect sizes on teacher attendance and student achievement within each study.

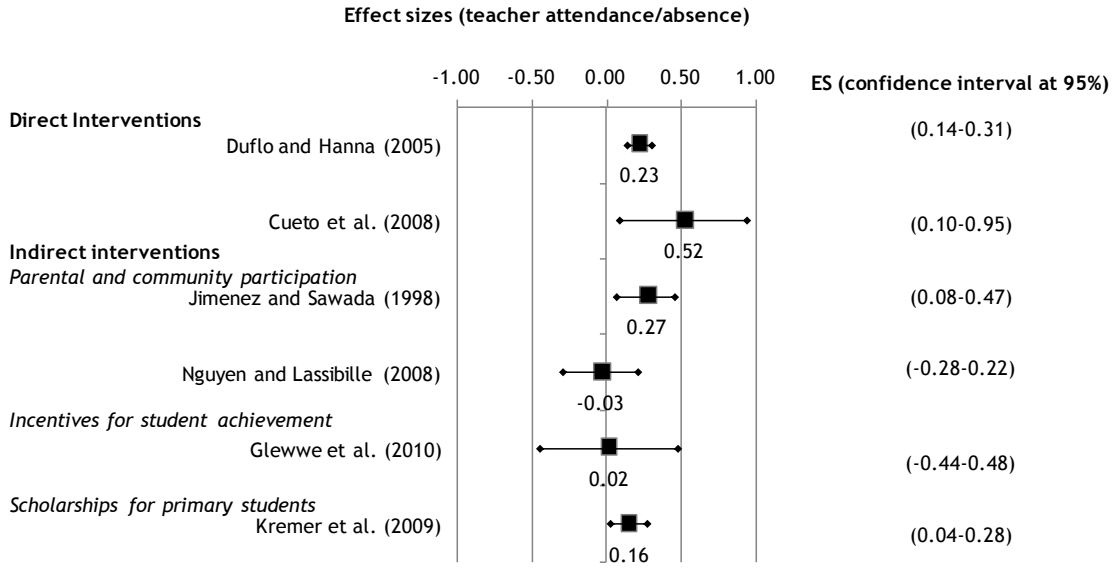
We did not pool the effect sizes across studies for two main reasons: (i) the programme interventions included in our final analytical sample were not strictly comparable, and (ii) even if we assumed that they were comparable, the maximum number of studies for each pooled effect size was two. Below we present the effect sizes for each study included.

Figure 4.1 shows the average effect sizes on teacher attendance per original study by type of intervention. In the case of the direct interventions, both effect sizes were statistically significant. Duflo and Hanna (2005) and Cueto et al. (2008) showed that through a programme intervention that targeted teachers directly (monitoring system) it was possible to increase teacher attendance. In terms of the magnitude of the effect sizes, the study developed by Cueto et al. (2008) (0.52, $p<0.05$) had a medium effect size while Duflo and Hanna (2005) (0.23, $p<0.05$) had a small one[8]; however, the study carried out by Cueto et al. (2008) had a smaller and more unbalanced sample size per intervention group than Duflo and Hanna's (2005) study, and this could explain the big difference in magnitude between effect sizes[9]. For indirect interventions, two out of four studies had a statistically significant effect on teacher attendance but these effect sizes were small. Jimenez and Sawada (1998) found that increasing community participation in student education had a spill-over effect on teacher attendance (effect size: 0.27, $p<0.05$); while Kremer et al. (2009) found this same indirect effect on teacher attendance (effect size: 0.16, $p<0.05$).

With regard to student achievement, none of the effect sizes estimated is significant at the 95 percent confidence interval. Figure 4.2 presents the effect sizes for student achievement. Once we pooled the effect sizes within each study, direct or indirect interventions did not have an impact on increasing student's achievement.

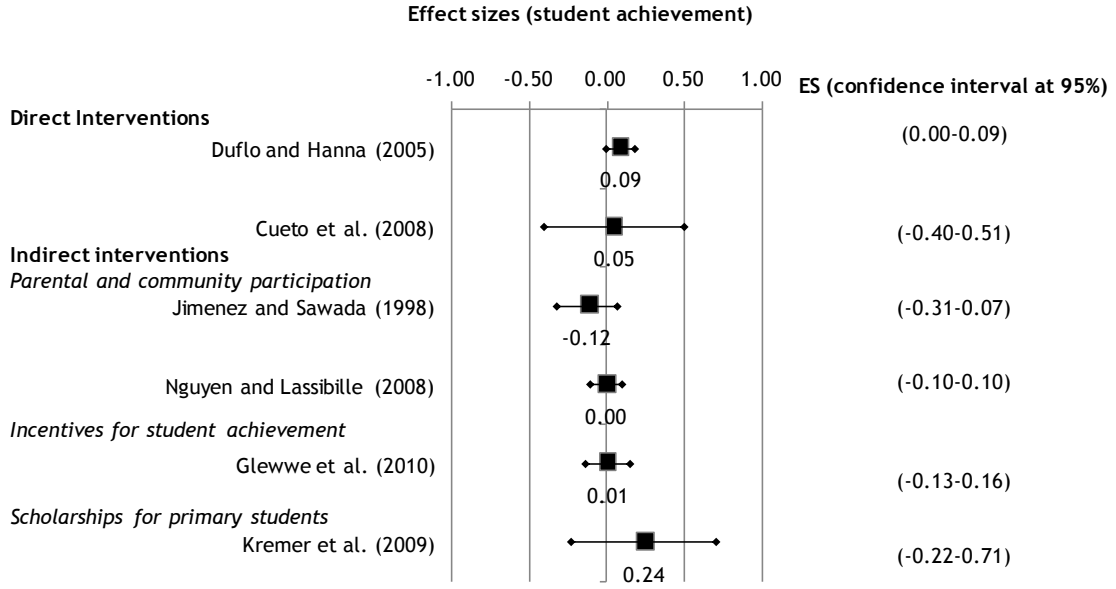
[8] Cohen (1988) indicated that a small effect size is 0.20, a medium is 0.50 and a large is 0.80.
[9] Slavin and Smith (2008) found that there is an indirect relationship between sample size and effect sizes, and it is more likely for studies with smaller sample sizes to have bigger effect sizes than those with bigger samples.

Figure 4.1: Effect sizes by type of educational intervention on teacher attendance[a]



[a] Jimenez and Sawada (1998) used as proxy for teacher absence the number of days that a student missed classes because the teacher did not attend school. We reversed the sign of the effect since days the teacher was absent is the complement of days the teacher was present at school.
ES = effect size.

Figure 4.2: Effect sizes by type of educational intervention on student achievement



5. Strengths and limitations of the systematic review

The systematic review had a fairly comprehensive search strategy. The search covered a range of databases and original studies not only in English but also in Spanish, French and Portuguese, and involved contact with key authors, citation tracking and handsearching. Dissertations were not included in the body of primary studies considered for the review since these are not generally available online. However, if the dissertations had been later published as a book or an article were included during our search of primary studies in journals and databases.

We combined the different effect sizes found in each primary study in order to obtain an overall effect size per outcome and study that would shed some light on the strength of the effect of educational interventions on teacher attendance. Our results suggest that direct interventions and indirect interventions related to incentives and greater parental monitoring are the most effective in improving this teacher attendance. However, these results should be viewed with caution given the small number of original studies dealing with this topic. This paucity made it difficult to perform additional analyses to address issues like publication bias or meta-regression analysis to control for heterogeneity within each type of educational intervention.

Nevertheless, identifying the existing limited number of rigorous impact evaluations of interventions (either direct or indirect) aimed at improving teacher attendance is a valuable finding in itself and clearly points out the need for more research on the effectiveness of such interventions.

6. Discussion, research and policy implications

Empirical studies have found national averages of teacher absenteeism in developing countries that range from 3 percent to 27 percent; these same studies suggested that within-country teacher absenteeism tends to be higher in poorer, more isolated schools. Thus, teacher absenteeism would be another factor contributing to unequal educational opportunities in these contexts; in this lies its importance for educational policy.

While there are studies on the magnitude of teacher absenteeism, there are only a few academically solid studies on how to reduce it. We have identified nine papers that met our inclusion criteria for a systematic review. Given this limited number, we should be very cautious about generalising from the results, which are summarised below. At the same time, the need for further studies in this area is obvious.

We have classified the nine interventions that the studies concentrated on into two categories: (i) direct interventions, where the main goal was to reduce teacher absenteeism; and (ii) indirect interventions, where reducing teacher absenteeism was an intermediate objective or a mechanism to reach the ultimate goal of improving student achievement.

Throughout this paper we have reported data on the effectiveness of these nine interventions, both describing the effects on relevant outcomes according to the original studies and supplying our own estimates of pooled effect sizes per outcome per study. When considering only the original studies, the two direct interventions had an effect on teacher attendance. The studies carried out by Duflo and Hanna (2005) and Cueto et al. (2008) showed that coupling monitoring systems with rewards is an effective mechanism to reduce teacher absenteeism; however, the effect on student achievement was mixed. Of indirect interventions, only three had an effect on teacher attendance. Jimenez and Sawada (1998), Kremer et al. (2009) and Duflo et al. (2008) showed small but significant effects on teacher attendance, suggesting that is possible to reduce teacher absenteeism through community involvement, or through programmes oriented to give students merit scholarships or to tracking students by prior achievement. However, only the first two also had an effect on student achievement.

Since all the included studies reported more than one effect size for teacher attendance and student achievement, as explained in section 2, we pooled the effect sizes per outcome per study. According to these estimates, direct interventions had an effect on teacher attendance but no effect on student achievement. In the case of indirect interventions, only two of them had an effect on teacher attendance but again there was no effect on student achievement.

The discrepancies between the effects reported by the original studies and the pooled estimates are explained by the method used to synthesise the effect. This synthesis took into consideration the sample size and standard error in the studies where results are reported for more than one sample. This led to a more robust estimation of the effect sizes and allowed us to calculate only one measure per outcome per study. A comparison of these two approaches is shown in Table 6.1.

Table 6.1: Summary of study effects by intervention and outcome

	Original studies		Statistical synthesis (pooled)	
	Teacher attendance	Student Achievement	Teacher attendance	Student Achievement
Direct intervention				
Duflo and Hanna 2005	Yes	Mixed	Yes	No
Cueto et al. 2008	Yes	Mixed	Yes	No
Indirect intervention				
Parental and community participation				
Jimenez and Sawada 1998	Yes	No	Yes	No
Banerjee et al. 2008	No	Mixed	n/a	n/a
Nguyen and Lassibile 2008	No	No	No	No
Incentives for student achievement				
Muralidharan and Sandararaman 2009	No	Yes	n/a	n/a
Glewwe et al. 2010	No	Mixed	No	No
Merit scholarship for students				
Kremer et al. 2009	Yes	Mixed	Yes	No
Ability tracking programmes				
Duflo et al. 2008	Yes	Yes	n/a	n/a

n/a: the data necessary for the statistical synthesis were not available.

Although improving attendance is not straightforward, the results of this systematic review provide evidence that a combination of better monitoring and powerful incentives (not necessarily output-based) seems effective in tackling teacher absenteeism. It is interesting to note that the four studies that succeeded in improving teacher attendance, according to the pooled effect sizes per study, have some form of monitoring as part of the intervention. The studies by Duflo and Hanna (2005), Cueto et al. (2008) and Jimenez and Sawada (1998) specifically included some form of external monitoring, while in the study by Kremer et al. (2009) the authors provided anecdotal evidence that parental monitoring did play a role. According to the authors, teacher interviews suggested greater parental monitoring occurred: parents began to ask teachers to work hard and visited the school more often to check up on teachers and encourage the students to put in more effort.

At the same time, the lack of consistent impact of increased teacher attendance on student achievement found in this systematic review makes it clear that a teacher in the classroom is an important but insufficient pre-requisite for improving achievement. For instance, Cueto et al. (2008) suggested that there may be a point where increased teacher attendance is no longer associated with higher student achievement. In other words, it is not only more time but what learning activities take place during this time that matters for increasing achievement. For example, there are studies on the pedagogical processes that occur inside the classroom that suggest that a lot of rote learning takes place in poor schools in developing countries; in Peru, this happened in both mathematics and reading classes (Cueto et al. 2004, 2006). These studies suggest that classes with higher levels of mental processing (referred to in the literature as 'cognitive demand') are associated with higher levels of thinking. To illustrate this, low levels of cognitive demand are exemplified in students' notebooks where students by the end of primary school are asked to write all numbers from 1 to a 1,000, or to write down page after page of text, as copied from a book. Higher levels of cognitive demand on the other hand are associated with diverse forms of problem solving. The implication of this is that if increased teacher time leads to writing from 1 to 2,000 (instead of 1,000), little increased achievement will occur (at least as measured by international achievement tests, which are often linked with problem solving). These same studies found no

association between number of exercises students solved in their notebooks and achievement, which again suggests that the key would be in the cognitive demand of the exercises and not how many are solved (usually the mathematics exercises consisted of arithmetic operations, and the students had to perform these but not understand and solve a problem). This is probably a reflection of how the teachers were educated themselves. In this paper we cannot provide a detailed account of what happened in the increased time (when it occurred), because most of the available studies did not provide information on this.

Going back to how to increase teacher attendance in developing countries, using our conceptual map (see Figure 1.1), most studies concentrated on one or more of the mechanisms specified there. At the teacher level, most of the interventions reviewed in this paper aimed to make teachers more satisfied with their income, and only one tried to alter teacher workload (Duflo et al. 2008) in order to change teacher satisfaction and eventually reduce teacher absenteeism. However, factors such as improving work environment (e.g. school climate) or promoting teacher professional development (e.g. teacher training) are not generally considered as tools in educational interventions to improve teacher absenteeism. The design of programmes oriented to improve these factors would help to expand the scope of evidence on interventions, taking into account both pecuniary and non-pecuniary incentives to improve teacher attendance.

The same occurs when determining strategies to tackle teacher attendance at the school and educational system level. There is an emphasis on creating and strengthening monitoring systems, but other school-related variables relevant for teacher attendance have not been tested in rigorous impact evaluations. For instance, educational programmes could assess variables like work group norms (e.g. explaining to teachers the effect of teacher absenteeism on students' outcomes), school principal leadership (e.g. improving organisational skills) and teacher administrative duties (e.g. implementing a pay check system for remote areas to avoid teachers missing classes in order to cash their payments), which according to the literature review above have an impact on teacher attendance. In sum, at the teacher and school levels, there are different tools that could be targeted by educational programmes to address teacher absenteeism.

More studies are needed to provide further evidence on the effectiveness of interventions aimed at improving teacher attendance. Establishing how, where and why teacher incentives programmes succeed or fail in increasing attendance and improving student achievement remains an important priority for future research. It is likely that this research area will rapidly expand in the next years. Seven of the nine included papers in this review were published between 2008 and 2010 suggesting the growing importance of the subject. For future research it seems necessary to include information on pedagogical practices within the classroom to help understand how interventions unfolded in practice and what the mechanisms are that explain the success (or not) of interventions. Furthermore, interventions to increase teacher attendance could be linked to teacher training programmes so that better use of pedagogical time takes place.

Regarding the quality of the impact evaluations, the standard these days for establishing cause and effect associations requires experimental or quasi-experimental designs with adequate controls. Studies which do not control for endogeneity of programme placement or self-selection into the programme will not be useful in accumulating evidence on programme effectiveness.

Finally, it is important that policy-makers realise that even pilot interventions should last longer than a year because it takes time for a programme to start having (and showing) an impact. It has been suggested above that teachers responded more effectively to the interventions in some studies after they had had time to see how the programmes worked, which adds to the need for programmes to be of longer duration.

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**These studies are cited in the text.*

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Appendices

Appendix 1.1: Authorship of this report

The authors of this report are:

Gabriela Guerrero, GRADE, Lima, Perú

Juan Leon, Penn State University, Pennsylvania, USA

Mayli Zapata, GRADE, Lima, Perú

Claudia Sugimaru, GRADE, Lima, Perú

Santiago Cueto, GRADE, Lima, Perú

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Contact details

Santiago Cueto,

GRADE, Av. Grau 915, Barranco,

Lima 4, Peru.

Tel: +51 1 247 9988

Email: scueto@grade.org.pe

Conflicts of interest

Cueto and Leon have participated in the design and evaluation of a relevant programme in Peru (see reference in reportbelow), which has been discontinued. We have will analyszed the resulting study using the same procedures as forwith the other included studies.

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Appendix 2.1: Coding tool

I. Study general information

1.1 Author	Please state the full name of the author(s)
1.2 Publication date	Please state the month and year of publication
1.3. Publication type	a. Journal article b. Working paper c. Final report d. Other (please specify)

II. Study aims and rationale

2.1 What are the broad aims of the study? Please write in authors' description if there is one. Elaborate if necessary but indicate which aspects are reviewers' interpretation	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)
2.2 What are the study research questions and/or hypotheses? Please write an authors' description if there is one. Elaborate if necessary but indicate which aspects are reviewers' interpretations.	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)
2.3 When was the study carried out? If the authors give a year or range of years, then put that in. If not, give a 'not later than' date by looking for a date of first submission to the journal, or for clues like the publication dates of other reports from the study.	a. Explicitly stated (please specify) b. Not explicitly stated (please specify) c. Not stated/unclear (please specify)
2.4 Do authors report on how the study was funded?	a. Explicitly stated (please specify) b. Not explicitly stated (please specify) c. Not stated/unclear (please specify)

III. Intervention design

3.1 Does the programme/intervention being studied have a formal name?	a. Yes (please specify) b. No c. Not stated/unclear (please specify)
3.2 What are the aims/objectives of the intervention? (Besides raising teacher attendance, does the programme aim at improving other teachers' outcomes and/or students' outcomes?)	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)
3.3. Is the intervention direct or indirect?	a. Direct b. Indirect
3.4 Content of the intervention package	Describe the intervention in detail, whenever possible copying the authors' description from the report. If specified in the report, also describe in detail what the control/comparison group(s) were exposed to.

3.5 In case the intervention provides incentives to teachers, what types of incentives are provided?	a. Monetary incentives (please specify) b. Non-monetary incentives (please specify) c. Both monetary and non-monetary incentives (please specify) d. No incentives are provided
3.6 In case the intervention provides incentives to teachers, how are they delivered?	a. On an individual basis b. On a group basis (please specify) c. On both an individual and a group basis (please specify) d. No incentives are provided
3.7. Causal pathways/theory of change. Please describe the theory underlying the intervention. When possible, please specify the underlying assumptions/mechanisms as well as the characteristics of the intervention and contextual factors that may affect project outcomes.	Describe in detail authors' description of/or evidence provided about causal pathways and/or theory of change
3.8. When did the intervention started?	a. Explicitly stated (please specify) b. Not explicitly stated (please specify) c. Not stated/unclear (please specify)
3.9 Duration of the intervention (If the intervention's length was less than 12 weeks, please choose a. If the length was longer than 12 weeks but less than a year, please choose b. and specify the length in weeks or months)	a. <12 weeks b. <1 year (please specify) c. 1 year d. >1 year (please specify) e. Ongoing intervention (please indicate the length of intervention as the length of the outcome assessment period)
3.10 Who provided the intervention?	a. State agency b. Private agency c. Not stated

IV. Target population and social context

4.1 In which country or countries was the intervention carried out?	Please list all the countries involved
4.2 What is/are the setting(s) of the intervention?	Please specify the following: a. Institutions: schools, primary schools, secondary schools b. Target population: primary teachers, secondary teachers c. Location: urban areas, rural areas d. Ethnicity background: indigenous, non-indigenous e. Socio-economic background: explicitly stated, implicit, not stated/unclear. In any case, please specify.

V. Study design and methods

5.1 What is the overall design and method of the study? (In any case, please specify)	a. Experimental design: RCT. To be classified as an RCT, the evaluation must: (i). compare two or more groups which receive different interventions or different intensities/levels of an intervention with each other; and/or with a group which

	does not receive any intervention at all AND (ii) allocate participants (individuals, groups, etc.) or sequences to the different groups based on a fully random schedule (e.g. a random numbers table is used). If the report states that random allocation was used and no further information is given then please keyword as RCT. If the allocation is NOT fully randomised (e.g. allocation by alternate numbers by date of birth) then please keyword as a non-RCT b. Quasi experimental design: experiment with no random allocation to groups but adequate controls. Please use this code if the evaluation compared two or more groups which receive different interventions, or different intensities/levels of an intervention to each other and/or with a group which does not receive any intervention at all BUT DOES NOT allocate participants (individuals, groups, etc.) or sequences in a fully random manner. This keyword should be used for studies which describe groups being allocated using a quasi-random method (e.g. allocation by alternate numbers or by date of birth) or other non-random method
5.2. What was the basis of any division made for making these groups?	a. Prospective allocation into more than one group (allocation takes place before the intervention) b. No prospective allocation but use of pre-existing differences to create comparisons groups c. Other (please specify)
5.3 How many groups are being compared?	a. Two b. Three c. Four d. More than four (please specify)
5.4 If prospective allocation into more than one group, what was the unit of allocation?	a. Not applicable (no prospective allocation) b. Individuals c. Groupings or clusters of individuals (please specify) d. Strata
	e. Not stated/unclear (please specify)
5.5 If prospective allocation into more than one group, which method was used to generate the allocation sequence?	a. Random
	b. Quasi-random
	c. Non-random
	d. Not stated/unclear (please specify)
	e. Not applicable (no prospective allocation)
5.6 How do the groups differ? Please describe the treatment and control groups	a. Explicitly stated (write in, as stated by the authors)
	b. Not explicitly stated (write in, as worded by the reviewer)
	c. Not stated/unclear (please specify)
5.7 When were the measurements of the outcome variable made in relation	a. Before and after
	b. Only after

to the intervention? In case different outcomes were measured at different times, please specify the time for each outcome.	c. Other (please specify)
5.8 What was/were the setting(s) of the study?	Please specify the following: a. Institutions: schools, primary schools, secondary schools b. Target population: primary teachers, secondary teachers c. Location: urban areas, rural areas d. Ethnicity background: indigenous, non-indigenous e. Socio-economic background: explicitly stated, implicit, not stated/unclear. In any case, please specify.
5.9 What was the total number of participants in the study? (the actual sample size). Please give numbers for each group participating in the study.	a. Explicitly stated (please specify) b. Not explicitly stated (please specify) c. Not stated/unclear (please specify)
5.10 Are the authors trying to produce findings that are representative of a given population?	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)
5.11 If the study involves studying samples prospectively over time, what proportion of the sample dropped out over the course of the study? (This refers to the attrition rate.)	a. Explicitly stated (please specify) b. Not explicitly stated (please specify) c. Not stated/unclear (please specify) d. Not applicable (not following samples prospectively)
5.12 For studies that involve following samples prospectively over time, do the authors provide any information on whether and/or how those who dropped out of the study differ from those who remained in the study?	a. Yes (please specify) b. No c. No drop-outs d. Not applicable (not following samples prospectively)
5.13 If the study involves following samples prospectively over time, do authors provide baseline values of key variables, such as those being used as outcomes, and relevant socio-demographic variables?	a. Yes (please specify) b. No c. No drop-outs d. Not applicable (not following samples prospectively)
5.14 Which methods/tools were used to collect the data? Please provide details including names for all tools used to collect data. State whether source is cited in the report.	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)
5.15 Who collected the data?	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)
5.16 Do the authors provide any evidence of the reliability of their data collection tools/methods?	a. Yes (please specify) b. No
5.17 Do the authors provide any evidence of the validity of their data collection tools/methods?	a. Yes (please specify) b. No

5.18 How is the outcome (teacher attendance) defined in the study?	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)
5.19 When was the outcome variable (teacher attendance) measured in relation to the end of the intervention?	a. Right after the end of the intervention b. Some time after the end of the intervention (please specify) c. Other (please specify)
5.20 Did the authors collect primary data that throw light on the causal chain form intervention activities to outcomes?	a. Yes (please specify what type of data) b. No c. Not stated/unclear (please specify) d. Not applicable
5.21 Which methods were used to analyse the data? Please specify any important analytic or statistical issues (e.g. statistical tests used)	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)
5.22 Do the authors describe strategies used in the analysis to control for bias from confounding variables?	a. Yes (please specify) b. No c. Not applicable

VI. Study results and conclusions

6.1 What are the results of the study as reported by the authors? Please provide information on all the aspects listed in the next column. If the information requested is not provided by the authors, please write Not Available.	Please specify the following results: a. Treatment and control means before and after intervention b. Effect size on teacher attendance c. Standard error d. Confidence interval e. p-value f. Other outcomes reported besides teacher attendance (e.g. teachers' pedagogical practices or students' achievement) g. Correlation between teacher attendance and other variables
6.2 Do the authors provide any useful data/information to trace the impact from intervention to final outcomes? Please extract additional information that could help in explaining the results, paying particular attention to any data on the causal chain and how interventions unfolded in practice.	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated d. Not applicable
6.3 What do the authors conclude about the findings of the study?	a. Explicitly stated (write in, as stated by the authors) b. Not explicitly stated (write in, as worded by the reviewer) c. Not stated/unclear (please specify)

VII. Critical appraisal questions

(Please consider your previous answers to questions on study design and methods)

7.1 Was the choice of the research design and methods appropriate for	a. Yes, it was (please specify) b. No, it wasn't (please specify)

addressing the research question(s) posed?	c. Authors didn't provide enough information on study design and methods and/or research questions
7.2 Have sufficient attempts been made to establish the reliability of data collection methods or tools?	a. Yes, good (please specify) b. Yes, some attempt (please specify) c. Authors didn't provide enough information on study methods
7.3 Have sufficient attempts been made to establish the validity of data collection tools and methods?	a. Yes, good (please specify) b. Yes, some attempt (please specify) c. Authors didn't provide enough information on study methods
7.4. To what extent are the research design and methods employed able to rule out any other sources of error/bias which would lead to alternative explanations for the findings of the study?	a. A lot (please specify) b. A little (please specify) c. Not at all (please specify) d. Authors didn't provide enough information on study methods
7.5 How generalisable are the study results?	a. High generalisability (please specify) b. Low generalisability c. Not at all generalisable d. Authors didn't provide enough information on study methods
7.6 What is the overall quality of the study?	a. High quality (to be classified as high quality the study must: have a randomised design with analysis at the unit of assignment or a large, well-controlled matched design using prospective allocation to groups AND have a large sample size (N=30 or larger) AND report the outcomes of programmes of more than 12 weeks in duration). b. Medium quality (to be classified as medium quality a study must have: a well-controlled matched design using retrospective comparisons or a cluster randomised design or randomised designs without pre-tests as long as attrition is low and equal between groups AND report the outcomes of programmes of more than 12 weeks in duration) c. Low quality (to be classified as low quality the study must: have a matched design in which pre-tests are not given or a matched design in which pre-test differences are more than 50% of a SD. Additionally, studies reporting the outcomes of programmes of less than 12 weeks in duration must be considered low quality).

Appendix 3.1: Search results

1. Databases: Detailed search results

Search term: attendance

Database	Hits	Date
British Library for Development Studies	280 (subset on education)	04/10/10

Search term: absence

Database	Hits	Date
British Library for Development Studies	3 (subset on education)	04/10/10

Search term: presence

Database	Hits	Date
British Library for Development Studies	4 (subset on education)	04/10/10

Search term: absenteeism

Database	Hits	Date
British Library for Development Studies	1 (subset on education)	04/10/10

Search term: truancy

Database	Hits	Date
British Library for Development Studies	0 (subset on education)	04/10/10

Search term: shirking

Database	Hits	Date
British Library for Development Studies	0 (subset on education)	04/10/10

Search term: (teacher NEAR attendance) AND intervention

Database	Hits	Date
EconPapers	4 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR attendance) AND program

Database	Hits	Date
EconPapers	14 (free text search)	05/10/10
EconLit	10 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR attendance) AND programme

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	10 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR attendance) AND incentives

Database	Hits	Date
EconPapers	14 (free text search)	05/10/10
EconLit	4 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR attendance) AND impact

Database	Hits	Date
EconPapers	12 (free text search)	05/10/10
EconLit	2 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR attendance) AND evaluation

Database	Hits	Date
EconPapers	10 (free text search)	05/10/10
EconLit	5 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR attendance) AND effect

Database	Hits	Date
EconPapers	14 (free text search)	05/10/10
EconLit	5 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR attendance) AND effects

Database	Hits	Date
EconPapers	13 (free text search)	05/10/10
EconLit	5 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR attendance) AND assessment

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND intervention

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND program

Database	Hits	Date
EconPapers	12 (free text search)	05/10/10
EconLit	6 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND programme

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	6 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND incentives

Database	Hits	Date
EconPapers	9 (free text search)	05/10/10
EconLit	4 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND impact

Database	Hits	Date
EconPapers	6 (free text search)	05/10/10
EconLit	3 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND evaluation

Database	Hits	Date
EconPapers	6 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND effect

Database	Hits	Date
EconPapers	4 (free text search)	05/10/10
EconLit	4 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND effects

Database	Hits	Date
EconPapers	8 (free text search)	05/10/10
EconLit	4 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR presence) AND assessment

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absence) AND intervention

Database	Hits	Date
EconPapers	3 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

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Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	5 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

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Database	Hits	Date
EconPapers	6 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absence) AND impact

Database	Hits	Date
EconPapers	12 (free text search)	05/10/10
EconLit	7 (abstract)	15/09/10
EconLit	1 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absence) AND evaluation

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absence) AND effect

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10

Search term: (teacher NEAR absence) AND effects

Database	Hits	Date
EconPapers	11 (free text search)	05/10/10

Search term: (teacher NEAR absence) AND assessment

Database	Hits	Date
EconPapers	3 (free text search)	05/10/10

Search term: (teacher NEAR absenteeism) AND intervention

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absenteeism) AND program

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10
EconLit	4 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absenteeism) AND programme

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	4 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absenteeism) AND incentives

Database	Hits	Date
EconPapers	8 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	1 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absenteeism) AND impact

Database	Hits	Date
EconPapers	8 (free text search)	05/10/10
EconLit	6 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absenteeism) AND evaluation

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR absenteeism) AND effect

Database	Hits	Date
EconPapers	6 (free text search)	05/10/10

Search term: (teacher NEAR absenteeism) AND effects

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10

Search term: (teacher NEAR absenteeism) AND assessment

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teacher NEAR truancy) AND intervention

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR truancy) AND program

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR truancy) AND programme

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR truancy) AND incentives

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	2 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR truancy) AND impact

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR truancy) AND evaluation

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR truancy) AND effect

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teacher NEAR truancy) AND effects

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teacher NEAR truancy) AND assessment

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teacher NEAR shirking) AND intervention

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR shirking) AND program

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR shirking) AND programme

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR shirking) AND incentives

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	2 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR shirking) AND impact

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR shirking) AND evaluation

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (teacher NEAR shirking) AND effect

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teacher NEAR shirking) AND effects

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teacher NEAR shirking) AND assessment

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND intervention

Database	Hits	Date
EconPapers	4 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND program

Database	Hits	Date
EconPapers	12 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND programme

Database	Hits	Date
EconPapers	4 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND incentives

Database	Hits	Date
EconPapers	8 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND impact

Database	Hits	Date
EconPapers	8 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND evaluation

Database	Hits	Date
EconPapers	5 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND effect

Database	Hits	Date
EconPapers	10 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND effects

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10

Search term: (teachers NEAR attendance) AND assessment

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND intervention

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND program

Database	Hits	Date
EconPapers	13 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND programme

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND incentives

Database	Hits	Date
EconPapers	10 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND impact

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND evaluation

Database	Hits	Date
EconPapers	11 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND effect

Database	Hits	Date
EconPapers	9 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND effects

Database	Hits	Date
EconPapers	10 (free text search)	05/10/10

Search term: (teachers NEAR presence) AND assessment

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND intervention

Database	Hits	Date
EconPapers	3 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND program

Database	Hits	Date
EconPapers	9 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND programme

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND incentives

Database	Hits	Date
EconPapers	11 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND impact

Database	Hits	Date
EconPapers	12 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND evaluation

Database	Hits	Date
EconPapers	3 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND effect

Database	Hits	Date
EconPapers	11 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND effects

Database	Hits	Date
EconPapers	16 (free text search)	05/10/10

Search term: (teachers NEAR absence) AND assessment

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND intervention

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND program

Database	Hits	Date
EconPapers	5 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND programme

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND incentives

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND impact

Database	Hits	Date
EconPapers	9 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND evaluation

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND effect

Database	Hits	Date
EconPapers	4 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND effects

Database	Hits	Date
EconPapers	8 (free text search)	05/10/10

Search term: (teachers NEAR absenteeism) AND assessment

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND intervention

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND program

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND programme

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND incentives

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND impact

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND evaluation

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND effect

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND effects

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR truancy) AND assessment

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND intervention

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND program

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND programme

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND incentives

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND impact

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND evaluation

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND effect

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND effects

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers NEAR shirking) AND assessment

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (teachers N5 attendance) AND intervention OR program OR programme

Database	Hits	Date
EconLit	4 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 attendance) AND incentives OR impact OR evaluation

Database	Hits	Date
EconLit	2 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 presence) AND intervention OR program OR programme

Database	Hits	Date
EconLit	5 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 presence) AND incentives OR impact OR evaluation

Database	Hits	Date
EconLit	2 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 absence) AND intervention OR program OR programme

Database	Hits	Date
EconLit	1 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 absence) AND incentives OR impact OR evaluation

Database	Hits	Date
EconLit	2 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 absenteeism) AND intervention OR program OR programme

Database	Hits	Date
EconLit	1 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 absenteeism) AND incentives OR impact OR evaluation

Database	Hits	Date
EconLit	5 (abstract)	19/10/10
EconLit	1 (title)	19/10/10

Search term: (teachers N5 truancy) AND intervention OR program OR programme

Database	Hits	Date
EconLit	0 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 truancy) AND incentives OR impact OR evaluation

Database	Hits	Date
EconLit	1 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 shirking) AND intervention OR program OR programme

Database	Hits	Date
EconLit	0 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (teachers N5 shirking) AND incentives OR impact OR evaluation

Database	Hits	Date
EconLit	0 (abstract)	19/10/10
EconLit	0 (title)	19/10/10

Search term: (staff NEAR attendance) AND intervention

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR attendance) AND program

Database	Hits	Date
EconPapers	3 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR attendance) AND programme

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR attendance) AND incentives

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR attendance) AND impact

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR attendance) AND evaluation

Database	Hits	Date
EconPapers	4 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR attendance) AND effect

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10

Search term: (staff NEAR attendance) AND effects

Database	Hits	Date
EconPapers	9 (free text search)	05/10/10

Search term: (staff NEAR attendance) AND assessment

Database	Hits	Date
EconPapers	6 (free text search)	05/10/10

Search term: (staff NEAR presence) AND intervention

Database	Hits	Date
EconPapers	3 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR presence) AND program

Database	Hits	Date
EconPapers	8 (free text search)	05/10/10
EconLit	2 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR presence) AND programme

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10
EconLit	2 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR presence) AND incentives

Database	Hits	Date
EconPapers	11 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR presence) AND impact

Database	Hits	Date
EconPapers	23 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR presence) AND evaluation

Database	Hits	Date
EconPapers	6 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR presence) AND effect

Database	Hits	Date
EconPapers	35 (free text search)	05/10/10

Search term: (staff NEAR presence) AND effects

Database	Hits	Date
EconPapers	46 (free text search)	05/10/10

Search term: (staff NEAR presence) AND assessment

Database	Hits	Date
EconPapers	11 (free text search)	05/10/10

Search term: (staff NEAR absence) AND intervention

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absence) AND program

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absence) AND programme

Database	Hits	Date
EconPapers	3 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absence) AND incentives

Database	Hits	Date
EconPapers	7 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absence) AND impact

Database	Hits	Date
EconPapers	12 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absence) AND evaluation

Database	Hits	Date
EconPapers	3 (free text search)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absence) AND effect

Database	Hits	Date
EconPapers	16 (free text search)	05/10/10

Search term: (staff NEAR absence) AND effects

Database	Hits	Date
EconPapers	18 (free text search)	05/10/10

Search term: (staff NEAR absence) AND assessment

Database	Hits	Date
EconPapers	5 (free text search)	05/10/10

Search term: (staff NEAR absenteeism) AND intervention

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absenteeism) AND program

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absenteeism) AND programme

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absenteeism) AND incentives

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absenteeism) AND impact

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absenteeism) AND evaluation

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR absenteeism) AND effect

Database	Hits	Date
EconPapers	2 (free text search)	05/10/10

Search term: (staff NEAR absenteeism) AND effects

Database	Hits	Date
EconPapers	4 (free text search)	05/10/10

Search term: (staff NEAR absenteeism) AND assessment

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (staff NEAR truancy) AND intervention

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR truancy) AND program

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR truancy) AND programme

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR truancy) AND incentives

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR truancy) AND impact

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR truancy) AND evaluation

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR truancy) AND effect

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10

Search term: (staff NEAR truancy) AND effects

Database	Hits	Date
EconPapers	1 (free text search)	05/10/10

Search term: (staff NEAR truancy) AND assessment

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (staff NEAR shirking) AND intervention

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR shirking) AND program

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR shirking) AND programme

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR shirking) AND incentives

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR shirking) AND impact

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR shirking) AND evaluation

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (staff NEAR shirking) AND effect

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (staff NEAR shirking) AND effects

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (staff NEAR shirking) AND assessment

Database	Hits	Date
EconPapers	0 (free text search)	05/10/10

Search term: (school NEAR attendance) AND intervention

Database	Hits	Date
EconPapers	4 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	31 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR attendance) AND program

Database	Hits	Date
EconPapers	42 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	79 (abstract)	15/09/10
EconLit	1 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR attendance) AND programme

Database	Hits	Date
EconPapers	4 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	79 (abstract)	15/09/10
EconLit	1 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR attendance) AND incentives

Database	Hits	Date
EconPapers	33 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	12 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR attendance) AND impact

Database	Hits	Date
EconPapers	89 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	114 (abstract)	15/09/10
EconLit	6 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR attendance) AND evaluation

Database	Hits	Date
EconPapers	63 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	23 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR attendance) AND effect

Database	Hits	Date
EconPapers	78 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR attendance) AND effects

Database	Hits	Date
EconPapers	77 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR attendance) AND assessment

Database	Hits	Date
EconPapers	12 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR presence) AND intervention

Database	Hits	Date
EconPapers	43 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR presence) AND program

Database	Hits	Date
EconPapers	66 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	10 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR presence) AND programme

Database	Hits	Date
EconPapers	17 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	10 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR presence) AND incentives

Database	Hits	Date
EconPapers	180 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	3 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR presence) AND impact

Database	Hits	Date
EconPapers	300 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	9 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR presence) AND evaluation

Database	Hits	Date
EconPapers	176 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	2 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR presence) AND effect

Database	Hits	Date
EconPapers	300 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR presence) AND effects

Database	Hits	Date
EconPapers	300 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR presence) AND assessment

Database	Hits	Date
EconPapers	98 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR absence) AND intervention

Database	Hits	Date
EconPapers	33 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	3 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absence) AND program

Database	Hits	Date
EconPapers	42 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	3 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absence) AND programme

Database	Hits	Date
EconPapers	12 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	3 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absence) AND incentives

Database	Hits	Date
EconPapers	92 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	4 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absence) AND impact

Database	Hits	Date
EconPapers	179 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	12 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absence) AND evaluation

Database	Hits	Date
EconPapers	109 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absence) AND effect

Database	Hits	Date
EconPapers	146 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR absence) AND effects

Database	Hits	Date
EconPapers	273 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR absence) AND assessment

Database	Hits	Date
EconPapers	55 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR absenteeism) AND intervention

Database	Hits	Date
EconPapers	1 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absenteeism) AND program

Database	Hits	Date
EconPapers	3 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	2 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absenteeism) AND programme

Database	Hits	Date
EconPapers	2 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	2 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absenteeism) AND incentives

Database	Hits	Date
EconPapers	18 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absenteeism) AND impact

Database	Hits	Date
EconPapers	24 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	5 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absenteeism) AND evaluation

Database	Hits	Date
EconPapers	12 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR absenteeism) AND effect

Database	Hits	Date
EconPapers	19 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR absenteeism) AND effects

Database	Hits	Date
EconPapers	39 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR absenteeism) AND assessment

Database	Hits	Date
EconPapers	2 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR truancy) AND intervention

Database	Hits	Date
EconPapers	0 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR truancy) AND program

Database	Hits	Date
EconPapers	0 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR truancy) AND programme

Database	Hits	Date
EconPapers	0 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR truancy) AND incentives

Database	Hits	Date
EconPapers	2 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR truancy) AND impact

Database	Hits	Date
EconPapers	2 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR truancy) AND evaluation

Database	Hits	Date
EconPapers	1 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR truancy) AND effect

Database	Hits	Date
EconPapers	1 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR truancy) AND effects

Database	Hits	Date
EconPapers	5 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR truancy) AND assessment

Database	Hits	Date
EconPapers	0 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR shirking) AND intervention

Database	Hits	Date
EconPapers	0 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR shirking) AND program

Database	Hits	Date
EconPapers	0 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR shirking) AND programme

Database	Hits	Date
EconPapers	1 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR shirking) AND incentives

Database	Hits	Date
EconPapers	22 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR shirking) AND impact

Database	Hits	Date
EconPapers	3 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR shirking) AND evaluation

Database	Hits	Date
EconPapers	2 (keywords and title, limited to the first 300 hits)	05/10/10
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10

Note: EconLit search done with proximity operator N5 instead of NEAR.

Search term: (school NEAR shirking) AND effect

Database	Hits	Date
EconPapers	3 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR shirking) AND effects

Database	Hits	Date
EconPapers	16 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (school NEAR shirking) AND assessment

Database	Hits	Date
EconPapers	0 (keywords and title, limited to the first 300 hits)	05/10/10

Search term: (teacher N5 absence) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	9 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	14 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teacher N5 absenteeism) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	3 (abstract)	15/09/10
EconLit	2 (title)	15/09/10
ScienceDirect	3 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teacher N5 truancy) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	0 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teacher N5 shirking) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	1 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teachers N5 attendance) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	6 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teachers N5 presence) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	11 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teachers N5 absence) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	2 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	14 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teachers N5 absenteeism) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	2 (abstract)	15/09/10
EconLit	1 (title)	15/09/10
ScienceDirect	3 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teachers N5 truancy) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	0 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teachers N5 shirking) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	1 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (staff N5 attendance) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	3 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (staff N5 presence) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	2 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (staff N5 absence) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	1 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (staff N5 absenteeism) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	1 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	2 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (staff N5 truancy) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	0 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (staff N5 shirking) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	0 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (school N5 attendance) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	185 (abstract)	15/09/10
EconLit	9 (title)	15/09/10
ScienceDirect	112 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (school N5 presence) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	15 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	12 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (school N5 absence) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	17 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	28 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (school N5 absenteeism) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	5 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	7 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (school N5 truancy) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	3 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	9 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (school N5 shirking) AND effect OR effects OR assessment

Database	Hits	Date
EconLit	0 (abstract)	15/09/10
EconLit	0 (title)	15/09/10
ScienceDirect	1 (abstract/title/keywords)	19/10/10

Note: ScienceDirect search done with proximity operator W/5 instead of N5.

Search term: (teacher N5 attendance) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	104 (abstract)	18/10/10
EBSCO	2(title)	18/10/10

Search term: (teacher N5 presence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	106bstract)	18/10/10
EBSCO	2(title)	18/10/10

Search term: (teacher N5 absence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	99 (abstract)	18/10/10
EBSCO	2 (title)	18/10/10

Search term: (teacher N5 absenteeism) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	31 (abstract)	18/10/10
EBSCO	2 (title)	18/10/10

Search term: (teacher N5 truancy) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	8 (abstract)	18/10/10
EBSCO	1 (title)	18/10/10

Search term: (teacher N5 shirking) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	1 (abstract)	18/10/10
EBSCO	0 (title)	18/10/10

Search term: (teachers N5 attendance) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	103 (abstract)	18/10/10
EBSCO	2 (title)	18/10/10

Search term: (teachers N5 presence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	99 (abstract)	18/10/10
EBSCO	2 (title)	18/10/10

Search term: (teachers N5 absence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	95 (abstract)	18/10/10
EBSCO	2 (title)	18/10/10

Search term: (teachers N5 absenteeism) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	31 (abstract)	18/10/10
EBSCO	2 (title)	18/10/10

Search term: (teachers N5 truancy) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	8 (abstract)	18/10/10
EBSCO	1 (title)	18/10/10

Search term: (teachers N5 shirking) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	1 (abstract)	18/10/10
EBSCO	0 (title)	18/10/10

Search term: (staff N5 attendance) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	43 (abstract)	18/10/10
EBSCO	2 (title)	18/10/10

Search term: (staff N5 presence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	58 (abstract)	18/10/10
EBSCO	1 (title)	18/10/10

Search term: (staff N5 absence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	37 (abstract)	18/10/10
EBSCO	0 (title)	18/10/10

Search term: (staff N5 absenteeism) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	19 (abstract)	18/10/10
EBSCO	1 (title)	18/10/10

Search term: (staff N5 truancy) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	6 (abstract)	18/10/10
EBSCO	0 (title)	18/10/10

Search term: (staff N5 shirking) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	0 (abstract)	18/10/10
EBSCO	0 (title)	18/10/10

Search term: (school N5 attendance) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	781 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10
EBSCO	34 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10

Search term: (school N5 presence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	179 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10
EBSCO	2 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10

Search term: (school N5 absence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	258 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10
EBSCO	2 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10

Search term: (school N5 absenteeism) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	106 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10
EBSCO	5 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10

Search term: (school N5 truancy) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	142 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10
EBSCO	5 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10

Search term: (school N5 shirking) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
EBSCO	0 (abstract, limited to studies published between 1990 and end- uly 2010)	19/10/10
EBSCO	0 (abstract, limited to studies published between 1990 and end-July 2010)	19/10/10

Search term: ((teacher OR teachers OR staff OR school) WITHIN 5 (attendance OR presence OR absence OR absenteeism OR truancy OR shirking)) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ERIC	1947 (keywords)	06/09/10
JSTOR	5 (title)	10/10/10

Note:

Search term: ((teacher OR staff OR school) WITHIN 5 (attendance OR presence OR absence OR absenteeism OR truancy OR shirking)) AND (effect OR effects OR assessment)

Database	Hits	Date
ERIC	848 (keywords)	11/10/10
JSTOR	14 (title)	07/10/10

Search term: (teachers WITHIN 5 (attendance OR presence OR absence OR absenteeism OR truancy OR shirking)) AND (effect OR effects OR assessment)

Database	Hits	Date
ERIC	79 (keywords)	11/10/10

Search term: ((teacher OR staff OR school) WITHIN 5 (attendance OR presence OR absence OR absenteeism OR truancy OR shirking)) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
JSTOR	105 (abstract)	07/10/10
PsycINFO	1571 (keywords)	11/10/10

Note: JSTOR search term is presented differently (((ab:("teacher attendance"~5 OR "teacher presence"~5 OR "teacher absence"~5 OR "teacher absenteeism"~5 OR "teacher truancy"~5 OR "teacher shirking"~5) OR ab:("staff attendance"~5 OR "staff presence"~5 OR "staff absence"~5 OR "staff absenteeism"~5 OR "staff truancy"~5 OR "staff shirking"~5)) OR ab:("school attendance"~5 OR "school presence"~5 OR "school absence"~5 OR "school absenteeism"~5 OR "school truancy"~5 OR "school shirking"~5)) AND ab:(intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment))

Search term: (teachers) WITHIN 5 (attendance OR presence OR absence OR absenteeism OR truancy OR shirking)) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
JSTOR	1 (title)	11/10/10
JSTOR	8 (abstract)	11/10/10
PsycINFO	98 (keywords)	11/10/10

Note: JSTOR search term is presented differently (ti:("teachers attendance"~5 OR "teachers presence"~5 OR "teachers absence"~5 OR "teachers absenteeism"~5 OR "teachers truancy"~5 OR "teachers shirking"~5) AND ti:(intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment))

Search term: (teacher | teachers | staff | school) + (attendance | presence | absence | absenteeism | truancy | shirking) + (intervention | program | programme | incentives | impact | evaluation | effect | effects | assessment)

Database	Hits	Date
NBER	973 (full text search of publications)	03/11/10
RePEc/IDEAS	756 (abstract)	20/10/10
RePEc/IDEAS	28 (title)	20/10/10
RePEc/IDEAS	0 (keywords)	20/10/10
Google Scholar	250 (limited to studies published in 1990–2010, limited to the first 250 hits)	27/10/10

Note: Google Scholar search done with boolean operator OR instead of |.

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal OR empleados OR colegio OR escuela OR institucion educativa) + (asistencia OR presencia OR ausencia OR ausentismo OR absentismo) + (intervencion OR programa OR incentivos OR impacto OR evaluación OR efecto OR efectos)

Database	Hits	Date
Google Scholar	250 (limited to studies published in 1990–2010, limited to the first 250 hits)	29/10/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur OR educateurs OR personnel OR ecole OR college OR lycee) + (assistance OR presence OR absence OR absenteisme) + (intervention OR programme OR encouragement OR impact OR evaluation OR effet OR effets)

Database	Hits	Date
Google Scholar	250 (limited to studies published in 1990–2010, limited to the first 250 hits)	31/10/10

Search term: (professor OR professores OR equipe OR escola OR colegio) + (assistencia OR comparecimento OR presenca OR ausencia OR absenteismo OR absentismo) + (intervencao OR programa OR incentivos OR impacto OR avaliacao OR efeito OR efeitos)

Database	Hits	Date
Google Scholar	250 (limited to studies published in 1990–2010, limited to the first 250 hits)	30/10/10

Search term: ((teacher OR teachers OR staff OR school) WITHIN 5 (attendance OR presence OR absence OR absenteeism OR truancy OR shirking)) AND (intervention OR program OR programme OR incentives OR impact OR evaluation OR effect OR effects OR assessment)

Database	Hits	Date
Sociological Abstracts	433 (keywords)	19/10/10
Pro-Quest	1000 (citation and abstract, limited to studies published in 1990–2010)	20/10/10

Note: Pro-Quest search done with proximity operator W/5 instead of WITHIN 5.

Search term: (teacher OR teachers OR staff OR school) AND attendance AND intervention

Database	Hits	Date
Oxford University Press Journals	2 (abstract and title)	20/10/10
World Bank	37 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND attendance AND program

Database	Hits	Date
Oxford University Press Journals	5 (abstract and title)	20/10/10
World Bank	52 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND attendance AND programme

Database	Hits	Date
Oxford University Press Journals	5 (abstract and title)	20/10/10
World Bank	52 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND attendance AND incentives

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	12 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND attendance AND impact

Database	Hits	Date
Oxford University Press Journals	9 (abstract and title)	20/10/10
World Bank	14 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND attendance AND evaluation

Database	Hits	Date
Oxford University Press Journals	4 (abstract and title)	20/10/10
World Bank	40 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND attendance AND effect

Database	Hits	Date
Oxford University Press Journals	14 (abstract and title)	20/10/10
World Bank	9 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND attendance AND effects

Database	Hits	Date
Oxford University Press Journals	14 (abstract and title)	20/10/10
World Bank	9 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND attendance AND assessment

Database	Hits	Date
Oxford University Press Journals	2 (abstract and title)	20/10/10
World Bank	36 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND intervention

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	43 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND program

Database	Hits	Date
Oxford University Press Journals	6 (abstract and title)	20/10/10
World Bank	69 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND programme

Database	Hits	Date
Oxford University Press Journals	4 (abstract and title)	20/10/10
World Bank	69 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND incentives

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	13 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND impact

Database	Hits	Date
Oxford University Press Journals	5 (abstract and title)	20/10/10
World Bank	21 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND evaluation

Database	Hits	Date
Oxford University Press Journals	2 (abstract and title)	20/10/10
World Bank	57 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND effect

Database	Hits	Date
Oxford University Press Journals	7 (abstract and title)	20/10/10
World Bank	13 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND effects

Database	Hits	Date
Oxford University Press Journals	7 (abstract and title)	20/10/10
World Bank	13 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND presence AND assessment

Database	Hits	Date
Oxford University Press Journals	3 (abstract and title)	20/10/10
World Bank	50 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND intervention

Database	Hits	Date
Oxford University Press Journals	4 (abstract and title)	20/10/10
World Bank	27 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND program

Database	Hits	Date
Oxford University Press Journals	5 (abstract and title)	20/10/10
World Bank	28 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND programme

Database	Hits	Date
Oxford University Press Journals	6 (abstract and title)	20/10/10
World Bank	28 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND incentives

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	14 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND impact

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	16 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND evaluation

Database	Hits	Date
Oxford University Press Journals	2 (abstract and title)	20/10/10
World Bank	24 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND effect

Database	Hits	Date
Oxford University Press Journals	4 (abstract and title)	20/10/10
World Bank	8 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND effects

Database	Hits	Date
Oxford University Press Journals	4 (abstract and title)	20/10/10
World Bank	8 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absence AND assessment

Database	Hits	Date
Oxford University Press Journals	4 (abstract and title)	20/10/10
World Bank	18 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND intervention

Database	Hits	Date
Oxford University Press Journals	4 (abstract and title)	20/10/10
World Bank	27 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND program

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	28 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND programme

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	28 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND incentives

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	14 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND impact

Database	Hits	Date
Oxford University Press Journals	3 (abstract and title)	20/10/10
World Bank	16 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND evaluation

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	24 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND effect

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	8 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND effects

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	8 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND absenteeism AND assessment

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	18 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND intervention

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND program

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND programme

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND incentives

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND impact

Database	Hits	Date
Oxford University Press Journals	2 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND evaluation

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND effect

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND effects

Database	Hits	Date
Oxford University Press Journals	1 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND truancy AND assessment

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND intervention

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND program

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND programme

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND incentives

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND impact

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND evaluation

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND effect

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND effects

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND shirking AND assessment

Database	Hits	Date
Oxford University Press Journals	0 (abstract and title)	20/10/10
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND asistencia AND intervencion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND asistencia AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND asistencia AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND asistencia AND impacto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND asistencia AND evaluacion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND asistencia AND efecto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND asistencia AND efectos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND asistencia AND intervencion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND asistencia AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND asistencia AND incentivos

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World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND asistencia AND impacto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND asistencia AND evaluacion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND asistencia AND efecto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

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Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND presencia AND intervencion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND presencia AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

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Search term: (empleados OR colegio OR escuela OR institucion educativa) AND presencia AND efectos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND ausencia AND intervencion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND ausencia AND programa

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World Bank	0 (simple search, publications and research)	21/09/10

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World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND ausencia AND efectos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND ausentismo AND intervencion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND ausentismo AND programa

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World Bank	0 (simple search, publications and research)	21/09/10

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World Bank	0 (simple search, publications and research)	21/09/10

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Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND ausentismo AND efectos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND ausentismo AND intervencion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND ausentismo AND programa

Database	Hits	Date
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Search term: (empleados OR colegio OR escuela OR institucion educativa) AND ausentismo AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND ausentismo AND impacto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND ausentismo AND evaluacion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND ausentismo AND efecto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND ausentismo AND efectos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND absentismo AND intervencion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND absentismo AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND absentismo AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND absentismo AND impacto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND absentismo AND evaluacion

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND absentismo AND efecto

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World Bank	0 (simple search, publications and research)	21/09/10

Search term: (profesor OR profesores OR docente OR docentes OR maestro OR maestros OR personal) AND absentismo AND efectos

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World Bank	0 (simple search, publications and research)	21/09/10

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Search term: (empleados OR colegio OR escuela OR institucion educativa) AND absentismo AND programa

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World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND absentismo AND incentivos

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Search term: (empleados OR colegio OR escuela OR institucion educativa) AND absentismo AND impacto

Database	Hits	Date
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Search term: (empleados OR colegio OR escuela OR institucion educativa) AND absentismo AND evaluacion

Database	Hits	Date
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Search term: (empleados OR colegio OR escuela OR institucion educativa) AND absentismo AND efecto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (empleados OR colegio OR escuela OR institucion educativa) AND absentismo AND efectos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND assistance AND intervention

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND assistance AND programme

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND assistance AND encouragement

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND assistance AND impact

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND assistance AND evaluation

Database	Hits	Date
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Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND assistance AND effet

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND assistance AND effets

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND assistance AND intervention

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND assistance AND programme

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND assistance AND encouragement

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Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND assistance AND effets

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Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND presence AND intervention

Database	Hits	Date
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Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND presence AND programme

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Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND presence AND effet

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND presence AND effets

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absence AND intervention

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absence AND programme

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absence AND encouragement

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absence AND impact

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absence AND evaluation

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absence AND effet

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absence AND effets

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absence AND intervention

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absence AND programme

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absence AND encouragement

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absence AND impact

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absence AND evaluation

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absence AND effet

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absence AND effets

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absenteisme AND intervention

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absenteisme AND programme

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absenteisme AND encouragement

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absenteisme AND impact

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absenteisme AND evaluation

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absenteisme AND effet

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (enseignant OR enseignants OR professeur OR professeurs OR instituteur OR instituteurs OR educateur) AND absenteisme AND effets

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absenteisme AND intervention

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absenteisme AND programme

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absenteisme AND encouragement

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absenteisme AND impact

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absenteisme AND evaluation

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World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absenteisme AND effet

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (educateurs OR personnel OR ecole OR college OR lycee) AND absenteisme AND effets

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND assistencia AND intervencao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND assistencia AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND assistencia AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND assistencia AND impacto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND assistencia AND avaliacao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND assistencia AND efeito

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND assistencia AND efeitos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND comparecimento AND intervencao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND comparecimento AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND comparecimento AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND comparecimento AND impacto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND comparecimento AND avaliacao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND comparecimento AND efeito

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND comparecimento AND efeitos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND presenca AND intervencao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND presenca AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND presenca AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND presenca AND impacto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND presenca AND avaliacao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND presenca AND efeito

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND presenca AND efeitos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND ausencia AND intervencao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND ausencia AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND ausencia AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND ausencia AND impacto

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World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND ausencia AND avaliacao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND ausencia AND efeito

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND ausencia AND efeitos

Database	Hits	Date
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Search term: (professor OR professores OR equipe OR escola OR colegio) AND absenteismo AND intervencao

Database	Hits	Date
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Search term: (professor OR professores OR equipe OR escola OR colegio) AND absenteismo AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absenteismo AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absenteismo AND impacto

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World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absenteismo AND avaliacao

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World Bank	0 (simple search, publications and research)	21/09/10

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World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absenteismo AND efeitos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absentismo AND intervencao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absentismo AND programa

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absentismo AND incentivos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absentismo AND impacto

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absentismo AND avaliacao

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absentismo AND efeito

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (professor OR professores OR equipe OR escola OR colegio) AND absentismo AND efeitos

Database	Hits	Date
World Bank	0 (simple search, publications and research)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (attendance OR presence) AND (intervention OR program)

Database	Hits	Date
SAGE Journals Online	160 (abstract)	21/09/10
SAGE Journals Online	3 (title)	21/09/10
SAGE Journals Online	0 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (attendance OR presence) AND (teacher OR teachers OR staff OR school) AND (attendance OR presence) AND (programme OR incentives)

Database	Hits	Date
SAGE Journals Online	85 (abstract)	21/09/10
SAGE Journals Online	3 (title)	21/09/10
SAGE Journals Online	0 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (attendance OR presence) AND (impact OR evaluation)

Database	Hits	Date
SAGE Journals Online	108 (abstract)	21/09/10
SAGE Journals Online	7 (title)	21/09/10
SAGE Journals Online	0 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (absence OR absenteeism) AND (intervention OR program)

Database	Hits	Date
SAGE Journals Online	86 (abstract)	21/09/10
SAGE Journals Online	1 (title)	21/09/10
SAGE Journals Online	1 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (absence OR absenteeism) AND (programme OR incentives)

Database	Hits	Date
SAGE Journals Online	46 (abstract)	21/09/10
SAGE Journals Online	2 (title)	21/09/10
SAGE Journals Online	0 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (absence OR absenteeism) AND (impact OR evaluation)

Database	Hits	Date
SAGE Journals Online	53 (abstract)	21/09/10
SAGE Journals Online	2 (title)	21/09/10
SAGE Journals Online	0 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (truancy OR shirking) AND (intervention OR program)

Database	Hits	Date
SAGE Journals Online	18 (abstract)	21/09/10
SAGE Journals Online	0 (title)	21/09/10
SAGE Journals Online	0 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (truancy OR shirking) AND (programme OR incentives)

Database	Hits	Date
SAGE Journals Online	7 (abstract)	21/09/10
SAGE Journals Online	0 (title)	21/09/10
SAGE Journals Online	0 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (truancy OR shirking) AND (impact OR evaluation)

Database	Hits	Date
SAGE Journals Online	10 (abstract)	21/09/10
SAGE Journals Online	0 (title)	21/09/10
SAGE Journals Online	0 (keywords)	21/09/10

Search term: (teacher OR teachers OR staff OR school) AND (attendance OR presence) AND (effect OR effects)

Database	Hits	Date
SAGE Journals Online	123 (abstract)	11/10/10
SAGE Journals Online	6 (title)	11/10/10
SAGE Journals Online	0 (keywords)	11/10/10

Search term: (teacher OR teachers OR staff OR school) AND (attendance OR presence) AND (assessment)

Database	Hits	Date
SAGE Journals Online	49 (abstract)	11/10/10
SAGE Journals Online	1 (title)	11/10/10
SAGE Journals Online	0 (keywords)	11/10/10

Search term: (teacher OR teachers OR staff OR school) AND (absence OR absenteeism) AND (effect OR effects)

Database	Hits	Date
SAGE Journals Online	63 (abstract)	11/10/10
SAGE Journals Online	2 (title)	11/10/10
SAGE Journals Online	0 (keywords)	11/10/10

Search term: (teacher OR teachers OR staff OR school) AND (absence OR absenteeism) AND (assessment)

Database	Hits	Date
SAGE Journals Online	24 (abstract)	11/10/10
SAGE Journals Online	0 (title)	11/10/10
SAGE Journals Online	0 (keywords)	11/10/10

Search term: (teacher OR teachers OR staff OR school) AND (truancy OR shirking) AND (effect OR effects)

Database	Hits	Date
SAGE Journals Online	0 (abstract)	11/10/10
SAGE Journals Online	0 (title)	11/10/10
SAGE Journals Online	0 (keywords)	11/10/10

Search term: (teacher OR teachers OR staff OR school) AND (truancy OR shirking) AND (assessment)

Database	Hits	Date
SAGE Journals Online	1 (abstract)	11/10/10
SAGE Journals Online	0 (title)	11/10/10
SAGE Journals Online	0 (keywords)	11/10/10

Search term: (teacher W/5 attendance) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	9 (abstract, title, keywords)	20/09/10

Search term: (teacher W/5 presence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	9 (abstract, title, keywords)	20/09/10

Search term: (teacher W/5 absence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	11 (abstract, title, keywords)	20/09/10

Search term: (teacher W/5 absenteeism) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	4 (abstract, title, keywords)	20/09/10

Search term: (teacher W/5 truancy) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	1 (abstract, title, keywords)	20/09/10

Search term: (teacher W/5 shirking) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	2 (abstract, title, keywords)	20/09/10

Search term: (staff W/5 attendance) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	1 (abstract, title, keywords)	20/09/10

Search term: (staff W/5 presence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	5 (abstract, title, keywords)	20/09/10

Search term: (staff W/5 absence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	3 (abstract, title, keywords)	20/09/10

Search term: (staff W/5 absenteeism) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	0 (abstract, title, keywords)	20/09/10

Search term: (staff W/5 truancy) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	1 (abstract, title, keywords)	20/09/10

Search term: (staff W/5 shirking) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	0 (abstract, title, keywords)	20/09/10

Search term: (school W/5 attendance) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	104 (abstract, title, keywords)	20/09/10

Search term: (school W/5 presence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	12 (abstract, title, keywords)	20/09/10

Search term: (school W/5 absence) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	26 (abstract, title, keywords)	20/09/10

Search term: (school W/5 absenteeism) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	15 (abstract, title, keywords)	20/09/10

Search term: (school W/5 truancy) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	14 (abstract, title, keywords)	20/09/10

Search term: (school W/5 shirking) AND (intervention OR program OR programme OR incentives OR impact OR evaluation)

Database	Hits	Date
ScienceDirect	1 (abstract, title, keywords)	20/09/10

Search term: (teacher W/5 attendance) AND (effect OR effects OR assessment)

Database	Hits	Date
ScienceDirect	6 (abstract, title, keywords)	19/10/10

Search term: (teacher W/5 presence) AND (effect OR effects OR assessment)

Database	Hits	Date
ScienceDirect	11 (abstract, title, keywords)	19/10/10

Search term: educational attendance

Database	Hits	Date
UNESDOC	37 (full text – UNESCO documents, UNESCO publications and NON-UNESCO publications, keywords)	04/10/10

Search term: Asistencia escolar

Database	Hits	Date
UNESDOC	12 (full text – UNESCO documents, UNESCO publications and NON-UNESCO publications, keywords)	04/10/10

Search term: Absentéisme scolaire

Database	Hits	Date
UNESDOC	1 (full text – UNESCO documents, UNESCO publications and NON-UNESCO publications, keywords)	04/10/10

Search term: Absentismo escolar

Database	Hits	Date
UNESDOC	0 (full text – UNESCO documents, UNESCO publications and NON-UNESCO publications, keywords)	04/10/10

Search term: Absenteeism

Database	Hits	Date
UNESDOC	0 (full text – UNESCO documents, UNESCO publications and NON-UNESCO publications, keywords)	04/10/10

Search term: Absenteeism

Database	Hits	Date
UNESDOC	0 (full text – UNESCO documents, UNESCO publications and NON-UNESCO publications, keywords)	04/10/10

2. Handsearch: detailed search results

Database	Hits	Date
Comparative and Education Review	0	04/11/10
Compare	0	04/11/10
International Journal of Educational Management	0	04/11/10
Journal of Educational Administration	0	05/11/10

Appendix 3.2: Papers excluded on full text and reason for exclusion

	References	Exclusion criteria
1.	Banerjee A, Duflo E (2006) Addressing absence. *Journal of Economic Perspectives* 20(1): 117–132.	Criterion 1
2.	Basu K (2006) *Teacher truancy in India: the role of culture, norms and economic incentives*. Working Paper No. 06-03.	Criterion 1
3.	Bowers T, McIver M (2000) *Ill health retirement and absenteeism amongst teachers*. Research Report No. 235.	Criterion 1
4.	Bridges EM, Hallinan MT (1978) Subunit size, work system interdependence, and employee absenteeism. *Educational Administration Quarterly* 14(2): 24–42.	Criterion 1
5.	Bruni Celli J, Ramos R, González M (2001) *Los maestros en Venezuela: carreras e incentivos*. Washington, DC: BID.	Criterion 1
6.	Chaudhury N, Hammer J, Kremer M, Mularidharan K, Rogers H (2004) *Roll call: teacher absence in Bangladesh*.	Criterion 1
7.	C Chaudhury N, Hammer J, Mularidharan K, Kremer M, Rogers H (2004) *Teacher and health care provider absence: a multi-country study*.	Criterion 1
8.	Chaudhury N, Hammer J, Kremer M, Muralidharan K, Rogers H (2006) Missing in action: teacher and health worker absence in developing countries. *Journal of Economic Perspectives* 20(1): 91–116.	Criterion 1
9.	Das J, Dercon S, Habyarimana J, Krishnan P (2005) Teacher shocks and student learning: evidence from Zambia. *The Journal of Human Resources* XLII(4): 820–862.	Criterion 1
10.	Di Gropello E, Marshall JH (2004) *Teacher effort and schooling outcomes in rural Honduras*.	Criterion 4
11.	Duflo E, Dupas P, Kremer M (2007) *Peer effects, pupil-teacher ratios, and teacher incentives: evidence from a randomized evaluation in Kenya*.	Criterion 1
12.	DuFour R (1983) Crackdown on attendance. The word is out. *NASSP Bulletin* 67(464): 133–135.	Criterion 1
13.	Fantuzzo J, Grim S, Hazan H (2005) Project Start: An evaluation of a community-wide school-based intervention to reduce truancy. *Psychology in the Schools 42*(6): 657–667.	Criterion 1
14.	Figlio DN, Kenny LW (2006) Individual teacher incentives and student performance.	
15.	Foldesy G, Foster L (1989) The impact, causes, and prevention of excessive teacher absenteeism. *The Clearing House* 63(2): 82–86.	Criterion 1
16.	Glewwe P, Holla A, Kremer M (2008) *Teacher incentives in the developing world*.	Criterion 1
17.	Hallam S, Rhamie J, Shaw J (2006) *Evaluation of the primary behaviour and attendance pilot*. Research Report No. 717. London, UK: Institute of Education, University of London.	Criterion 1
18.	UNESCO Regional Seminar on Primary School Attendance. (1992) *Innovative measures to overcome socio-economic obstacles to primary school attendance: report of a regional seminar*. Bangkok: UNESCO Principal Regional Office for Asia and the Pacific.	Criterion 1
19.	Jiménez E, Sawada Y (2009) Does community management help keep children in schools? Evidence using panel data from El Salvador's EDUCO Program.	Criterion 1
20.	Kremer M, Chaudhury N, Rogers FH, Muralidharan K, Hammer J (2005) Teacher absence in India: a snapshot. *Journal of the European Economic Association* 3: 658–667.	Criterion 1
21.	Luiselli JK, DiGennaro FD, Christian WP, Markowski A, Rue HC, St Amand C-A, Ryan CJ (2009) Effects of an informational brochure, lottery-based financial incentive, and public posting on absenteeism of direct-care human services employees. *Behavior Modification* 33(2): 175–181.	Criterion 1

	References	Exclusion criteria
22.	Marshall MT, Zenteno D (2004) *Programas de mejoramiento de las oportunidades: el Liceo para Todos en Chile*. Paris: International Institute for Educational Planning.	Criterion 1
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27.	Nielsen HD (2007) Empowering communities for improved educational outcomes: some evaluation findings from the World Bank. *Prospects* 37(1): 81–93.	Criterion 1
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35.	Santibañez, L. (2010) Teacher incentives. In: Brewer E, McEwan PJ (eds) *The economics of education,* 3rd edn. Elsevier, pages 481–488	Criterion 1
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Appendix 4.1: Additional information on the synthesis of results

Total number of effect sizes by study and type of outcome

Study	Country	Author	Type of intervention	Quality of the study	Number of effect sizes	
					Absenteeism /attendance (N=33)	Achievement (N=70)
1.	India	Duflo and Hanna 2005	Direct	High	3	18
2.	Peru	Cueto et al. 2008	Direct	Medium	3	6
3.	El Salvador	Jimenez and Sawada 1998	Indirect	Medium	4	2
4.	Madagascar	Nguyen and Lassibille 2008	Indirect	High	12	16
5.	Kenya	Glewwe et al. 2010	Indirect	High	8	10
6.	Kenya	Kremer et al. 2009	Indirect	High	3	18

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Evidence for Policy and Practice Information and Co-ordinating Centre (EPPI-Centre)
Social Science Research Unit
Institute of Education, University of London
18 Woburn Square
London WC1H 0NR

Tel: +44 (0)20 7612 6397
http://eppi.ioe.ac.uk
http://www.ioe.ac.uk/ssru

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