UK public spending on babies, children, and young people

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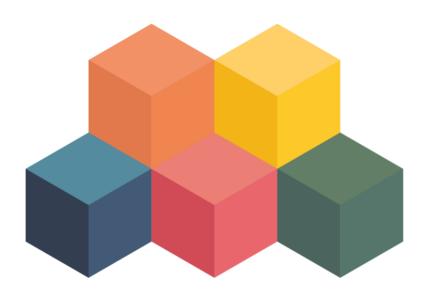




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Executive Summary

The UK's leading children's charities want to ensure sufficient attention and resources are devoted to children. Alma Economics has been commissioned to explore the evidence on public spending on babies, children, and young people in the UK as a percentage of Gross Domestic Product (GDP). Our analysis estimates the current level of spending on babies, children, and young people as a percentage of GDP. We then explore possible benchmarks by looking at comparisons with other OECD countries to suggest a target for UK spending. Finally, we consider existing research on the fiscal and social returns to spending on children in health, education, social care, and welfare.

Our analysis of current spending on children builds on the methodology used by the Institute for Fiscal Studies in research for the Children's Commissioner. We follow two key principles in identifying spend that is in scope: (i) identifiability of spending as benefiting specific demographic groups, and (ii) materiality of the size of expenditure. Our analysis suggests that UK total spending on babies, children, and young people amounted to £191.1 billion or 8.57% of UK GDP in 2022-23. The majority of this spending is devoted to education, 4.3% of UK GDP (or £96.6 billion). The remaining key areas of spending we have identified are: (i) welfare, amounting to £62.6 billion or 2.81% of UK GDP; (ii) children's services and social care, reaching over £17 billion or 0.78% of UK GDP; and (iii) health, representing an investment of £14.6 billion or 0.65% of UK GDP.

Spending in England represents the vast majority of UK spending on babies, children, and young people. Of the £191.1 billion spent across the UK, we estimate that £153.2 billion or 80% corresponds to spending in England. Scotland is the second largest spender in the identified areas (£18.2 billion), followed by Wales (£12.3 billion), and Northern Ireland (£7.6 billion)¹.

To explore a target percentage of UK GDP that could be spent on babies, children, and young people we compared UK spending against other OECD countries. Using OECD data, we created three benchmarks based on three averages: (i) the expenditure of the five countries that spend the largest proportion of their GDP on each of education, health, and social protection, (ii) the expenditure of the ten countries with the highest spending in each of the previous areas; and (iii) the expenditure of the ten countries with the highest spending in total across these areas. The UK falls below these benchmarks in each policy area and in total. For UK spending to match these benchmarks, spending on children would need to increase to 11.16% of GDP, 10.31% or 9.59% respectively. The UK would need to invest an additional £58 billion at current prices to reach the first benchmark, or £39 billion and £23 billion to reach the other two benchmarks respectively.

Investing in the aforementioned areas has been associated with improved outcomes for children. For instance, a 1 percentage point increase in the share of public health spending and public education spending in the GDP of countries with good governance lowers the under-5 mortality rate by 0.32% and the primary education failure rate by 0.7%.

¹ Spending does not sum to the UK total due to rounding.



Introduction

Background

The need for additional investment in children is increasingly being recognised. For instance, last year's Independent Review of Children's Social Care highlighted the need for investment in this area and offered evidence of the cost-effectiveness of the proposed reforms. Subsequent research by Alma Economics has highlighted that due to delays in acting on the Review's recommendations, the need for additional investment in children's services could be even higher.

The Children's Coalition of the UK's leading children's charities wants to ensure sufficient attention and resources are devoted to children. To that end, Alma Economics has been commissioned to carry out research exploring the percentage of GDP spent on babies, children, and young people in the UK and internationally.

Below we explain our methodological approach, along with key sources and assumptions. Subsequent sections cover (i) our estimates of current UK spending on babies, children, and young people; (ii) our suggested target percentages of UK GDP that should be spent on babies, children, and young people based on international and historical benchmarks; and (iii) indicative evidence on the potential impact and benefits from increased investment in social care and welfare. Lastly, we have included in an Appendix indicative returns on investing in health and education.

Methodological approach

We first conducted a review of existing approaches to measuring spending on children to explore potential spending lines for inclusion. The evidence we reviewed consisted of previous international research estimating spending on children, such as the 2022 Kids Share report by the Urban Institute. Unlike defence spending or official development assistance, there are no widely accepted benchmarks for spending on children as a proportion of the size of an economy. Nor is there an internationally recognised approach to measuring spending on children.

Our approach builds on the methodology used by the Institute for Fiscal Studies (2018) in research for the Children's Commissioner. In particular, we examined the current UK spending on babies, children, and young people (up to 18 years old) based on the following key principles:

- **Identifiability:** We examined spending that is identifiable as benefiting specific demographic groups. While there is additional spending benefiting the population in general, including children (e.g. expenditure on national defence or transport infrastructure), it has not been included in our analysis as there is no robust method of apportioning part of this spending to children. For instance, capital investments in housing affect parents and children alike. These benefits are also distributed across time, further hindering their attribution to specific groups.
- Materiality: We focused on spending lines that are material in size, given the ultimate aim of
 the project was to compare spending on children with the total UK GDP. As a result, there
 might be additional spending directly relevant to children that has not been considered, if its
 inclusion would not have significantly affected our estimates.

As a result of these criteria, we focused on four main areas of spending on babies, children, and young people, namely: (i) welfare, (ii) education, (iii) children's services and social care, and (iv) health. Then, we collated UK data on potential spending lines, identified data gaps, and judged the data against the principles above. The table below presents individual spending lines under each identified area of spending.



Table 1. Key identified areas of spending

Welfare	Education	Children's services and social care	Health
Child and working tax credit	Early years	Children's centres ²	Primary care
Housing benefit	Primary schools	Safeguarding and family support ³	Secondary care
Out-of-work benefits	Secondary schools	Looked after children	Community care
Non-means tested benefits	Pupil premium	Young people ⁴	
Childcare	Other schools/education		
Maternity benefits	School sixth forms		
State pension ⁵	Further education		
Child benefit			
Council tax benefit			
Pension credit			
Devolved benefits			

Identifying spending on children in welfare and health

While our desk-based research allowed us to narrow our search to four main areas of spending, not all spending lines relate directly to children. In primary and secondary education, children's services, and children's social care, it is a reasonable assumption that spending is targeted at children. However, this is less clear in welfare and health.

Most health spending is targeted at adults (Kelly et al., 2016). Research suggests that secondary and community health spending per adult is double the amount for children, while expenditure on primary care is almost three times higher for adults compared to children (IFS, 2017). To estimate the size of health spending applicable to children we have used NHS data to look at the amount of care that children receive. In some cases, e.g. emergency care, NHS data provides an estimate of the total cost of providing services by age. In other areas, including inpatient care, we have data from NHS Hospital Episode Statistics which break down service utilisation by age, but not detailed figures on the cost of each episode. As a result, we used NHS unit costs from the NHS' National Cost Collection to estimate the average cost of an episode of paediatric care and used that to estimate the total cost of inpatient care services for children.

For households that receive benefits, it is challenging to estimate the extent to which spending benefits children. For instance, housing benefit is claimed both by parents and individuals without

² Children's centres spending includes expenditure on Sure Start Children's Centres, services delivered through them, related management activities, and other spend on children under 5.

⁴ Spending on young people includes youth justice, substance misuse, and teenage pregnancy services, among others.

³ Family support includes Family Hubs and Start for Life funding.

⁵ A small proportion of state pension (2%) and pension credit (3%) has been included in our calculations as it is claimed by families or single parents with children. Percentages have been inferred from the Institute of Fiscal Studies (2018) report mentioned later in the draft.



children, while even benefits claimed exclusively by parents might not be entirely benefiting children. Several alternative approaches have been suggested in the literature to estimate welfare spending applicable to children. One approach is including only child-contingent benefits, that is benefits that can only be claimed by individuals caring for children. However, this approach does not account for much of the welfare spending which will benefit children, such as Universal Credit or working tax credits. As a result, we followed the Institute for Fiscal Studies (2018) methodology, which allows for the consideration of benefits both directly and indirectly supporting children. This approach leverages the Family Resources Survey (ONS, 2021) which presents the prevalence of each benefit among a representative sample of benefit units⁶ in the UK. Specifically, the survey estimates how common each benefit is in each benefit unit (e.g. of all couples with children in the survey, x number claimed child tax credit). Using this as a basis, we calculated the percentage of each benefit claimed by families with children and single parents with children (e.g. of all benefit units claiming child tax credit, y% were couples with children). We then applied these percentages to the total spending on each benefit to calculate the spending which is likely to benefit children.

Sensitivity analysis of welfare spending

As detailed in the previous section, there are alternatives to our approach to estimating welfare spending on children, babies, and young people. This section presents an alternative estimate of welfare spending including only spending on child contingent benefits⁷. The results of our analysis are presented in Table 2.

Table 2. Welfare spending sensitivity analysis

Scenario	Welfare spending (2022-23, £bn)	Welfare spending (% of UK GDP)
Baseline measure	61.3	2.81%
Child contingent benefits only	20.8	0.99%

As discussed in the previous section, our baseline approach includes spending on child contingent benefits and spending on other benefits going to households with children. This approach might have led to an overestimation of welfare spending but has been chosen because it allows us to consider wider benefits that indirectly support children.

Spending across the UK

Spending on health, education and social care is devolved across UK nations, in contrast with most welfare spending. Our analysis of welfare spending was primarily based on data from the Department of Work and Pensions (2023) and HM Revenue and Customs (2023) which include England, Northern Ireland, Wales, and part of Scotland expenditure. In cases where benefits have been devolved to Scotland, such as housing benefits and carers' allowance, we supplemented our analysis with Scottish Government Statistics (2023).

For the remaining three areas of spending, our initial analysis focussed on England, as this represents the vast majority of total UK spending and has the clearest breakdowns of spending. Then, we leveraged HM Treasury (2022) analysis showing the allocation of identifiable expenditure between the regions and nations of the UK. The expenditure included in the HM Treasury analysis does not

⁶ Benefit unit is defined as "a single adult or couple living as married or cohabitating and any dependent children" (ONS, 2019).

⁷ Child contingent benefits are: child tax credit, carer's allowance, maternity allowance, statutory maternity allowance,



completely coincide with the spending lines in our analysis. However, it is reasonable to assume that the relative size of the expenditure in each spending area in England compared to the rest of the UK nations would be similar between HMT and our analysis. This allows us to calculate the ratio of each nation's expenditure compared to England across the three remaining spending areas, as defined by HMT. These ratios were then applied to the spending in England we had already identified across education, health, and social care to produce estimates for the UK.

UK Gross Domestic Product

To calculate the spending on babies, children, and young people as a percentage of UK GDP we used the latest annual GDP data from the Office for National Statistics (2022).



Current spending on babies, children, and young people

This section presents the results of our analysis of current UK spending on babies, children and young people across the four identified areas. Details on our approach to arriving at these estimates are presented in the previous chapter. As shown in Table 3, the total spending amounts to approximately £191.1 billion or 8.57% of UK GDP. Education was the largest of the four areas, accounting for 51% of all spending or 4.33% of GDP.

Table 3. Current UK spending on babies, children, and young people, 2022-23

Spending area	UK spending (£bn)	% of GDP
Welfare	62.6	2.81%
Education	96.6	4.33%
Children's services and social care	17.3	0.78%
Health	14.6	0.65%
Total	191.1	8.57%

Spending breakdown by area

The following sections present detailed breakdowns of spending within the four areas presented above. Table 4 presents the total UK spending per benefit applicable to children. As detailed in the Methodology section, we have used the Family Resources Survey (ONS, 2021) to calculate the proportion of each benefit that is claimed by families with children or single parents with children. The resulting percentages are presented in the third column and are then applied to total spending per benefit.

The results presented in the table below indicate that the most significant part of welfare spending on children and young people is Universal Credit which alone accounts for 34% of total welfare spending.

Table 4. Welfare spending, 2022-23

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Spending category	Benefit	Percentage Applicable to Children	UK spending (£bn)
Child and working tax credit	Child and working tax credit	94%	8.323
Housing benefit	Housing benefit	18%	2.825
	Discretionary housing payments	18%	0.098
	Income support	27%	0.178
Out of work benefits	Jobseeker's allowance	29%	0.093
	Incapacity benefit	38%	0.001



	Employment and support allowance	12%	1.481
	Universal credit	47%	21.125
	Attendance allowance	42%	2.981
Non-means	Disability living allowance	100%8	3.114
tested benefits	Personal independence payment	15%	2.762
Childcare	Carer's allowance	50%	1.749
	Maternity allowance	100%	0.403
Maternity benefits	Statutory maternity pay	100%	2.697
	Sure Start maternity grant	100%	0.025
Childcare	Tax-free childcare	100%	0.533
State pension	State pension ⁹	2%	1.703
Child benefit	Child benefit	97%	11.286
Council tax benefit	Council tax rebate	25%	0.719
Pension credit	Pension credit ⁹	3%	0.168
	Child payments	100%	0.249
Devolved benefits	Best Start Grant and Best Start Foods Payments	100%	0.117
	Young Carer Grant	100%	0.003

As presented in Table 5, the most significant areas of expenditure on education are primary school and secondary school spending, amounting to almost £33 billion and £28bn respectively. The analysis includes both local authority and central government spending.

Table 5. Education spending, 2022-23

Type of education	UK spending (£bn)
Early years	7.203
Primary schools	32.958
Secondary schools	27.732
Pupil premium	3.326

⁸ We are using directly the child component of disability living allowance, thus all of it applies to children.

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⁹ Inferred from IFS (2018).



Other schools/education	16.846
School sixth forms	1.018
Further education	7.543

Table 6 presents the main areas of UK spending on children's social care. The majority of expenditure in this area is spending on looked after children, representing 52% of all social care spending or almost £9 billion.

Table 6. Children's services and social care, 2022-23 (£)

Type of care	UK spending (£bn)
Children's centres	0.736
Safeguarding and family support	6.614
Looked after children	8.929
Young people	1.054

Lastly, Table 7 shows spending on secondary and primary care applicable to children. The most significant cost element in children's health is inpatient care, amounting to approximately £4.6 billion (or 31% of children's health expenditure), followed by outpatient care at £3.3 billion (or 23% of children's health expenditure).

Table 7. Children's health spending, 2022-23 (£)

Care category	Type of care	UK spending (£bn)
	Inpatient	4.601
	Outpatient	3.349
Secondary care	A&E	0.940
	Critical care	0.893
	Mental health	1.388
Community care	Community care	0.433
	Dentistry	0.859
Primary care	GP	0.879
Primary care	Prescriptions	1.098
	Ophthalmic	0.177



Spending breakdown by UK nation

This section shows an estimated breakdown of spending across UK nations in each of the four key areas of spending. As explained in detail in the Methodology chapter, we used HM Treasury (2022) analysis to apportion UK spending on children to each constituent nation. The HMT analysis shows how much each nation is spending on education, health, and social protection across all ages, in absolute numbers. We examined how this spending compares to England's in each of the four identified spending areas. This allowed us to create ratios which we then applied to the spending on children we had calculated for England.

The results of this analysis are presented in Table 8. England's spending (£153.2 billion) represents the vast majority of UK expenditure on children. Scotland is the second largest spender (£18.2 billion), followed by Wales (£12.3 billion), and Northern Ireland (£7.6 billion).

Table 8. Spending by UK nations, 2022-23 (billion £)

Spending area	England spending	Scotland spending	Wales spending	Northern Ireland spending
Welfare	51.9	4.4	3.2	3.1
Education	76.2	9.6	6.8	4.1
Children's services and social care	12.7	2.9	1.7	0.1
Health	12.4	1.3	0.6	0.3
Total	153.2	18.2	12.3	7.6



Benchmarking

This chapter presents our analysis to calculate a proposed target percentage of UK GDP to be spent on babies, children, and young people. The first section outlines our methodological approach and three alternative benchmark options. The second section includes evidence of positive outcomes from the countries included in the benchmarks, justifying the proposed investment increase.

Approach to benchmarks

As discussed previously, there are no existing benchmarks in use internationally and no established methodology for which lines of spending should be included. To explore what a target could be, we conducted cross-sectional and historical comparisons.

The historical comparisons consisted of looking at OECD data (2020) for UK spending over time. These suggest that UK spending on health has grown as a percentage of GDP in recent years. This is likely, in part, to reflect spending related to COVID-19. By contrast, spending on social protection has fallen as a percentage of GDP in every year since 2010. UK education spending rose as a percentage of GDP between 2008 and 2014 before falling between 2014 and 2019. The latest OECD figures suggest that education spending in 2010 and 2019 were similar as a percentage of GDP.

The cross-sectional comparisons consisted of analysing OECD data on national spending on health, education, and social protection¹⁰ across countries. Table 9 presents the top 10 spenders in each area and across areas (overall), excluding the UK which was among the top 10 spenders in education (9th), health (6th), and overall (10th). We excluded the UK and replaced it with the next highest spender on each occasion to ensure that the UK is not biasing the benchmarks, as our aim was to find other comparable countries.

The rankings are based on the latest complete data available for each spending area. Education, social protection, and welfare spending are based on 2019 data, while health spending is based on 2021 data and includes both compulsory and public spending.

Table 9. Top spending countries as a percentage of GDP, by spending area

Education	Social protection/welfare (% of GDP spent)	Health	Overall
(% of GDP spent)		(% of GDP spent)	(% of GDP spent)
Norway	Sweden	United States (1.07%)	Norway
(4.59%)	(3.42%)		(8.29%)
Iceland (4.34%)	Luxembourg (3.36%)	Germany (0.83%)	Iceland (8.23%)
South Africa (4.29%)	Iceland (3.34%)	France (0.76%)	Sweden (8.05%)

¹⁰ These figures are collected by the OECD and are not based on the same criteria we used and are therefore not directly comparable to the figures described in earlier sections of this report. When considering the difference between the UK and other OECD countries we have used the UK figures submitted to the OECD in these datasets, this improves comparability across countries. We have then applied percentage increases to the baseline figure we calculated for the UK based on the assumption that if OECD figures for UK spend go up by x% then the figure we calculate from our approach would increase by the same proportion.



United Kingdom (3.41%)	United Kingdom (2.41%)	United Kingdom (0.70%)	United Kingdom (6.52%)
Denmark (3.36%)	France (2.71%)	Finland (0.61%)	Luxembourg (6.44%)
Korea (Republic of) (3.39%)	Belgium (2.77%)	Belgium (0.64%)	Estonia (6.66%)
Australia (3.42%)	Finland (2.89%)	Austria (0.67%)	Israel (6.72%)
Finland (3.70%)	Poland (3.02%)	Sweden (0.69%)	France (6.82%)
Belgium (3.91%)	Norway (3.19%)	New Zealand (0.70%)	Finland (7.20%)
Sweden (3.94%)	Estonia (3.21%)	Netherlands (0.71%)	Denmark (7.29%)
Israel (4.27%)	Denmark (3.31%)	Japan (0.75%)	Belgium (7.32%)

We created three cross-sectional benchmarks. In each case, we first calculated the average spending across countries, as a percentage of each country's GDP. We then estimated the percentage difference of the average compared to UK spending in each area and in total. Lastly, we applied these percentage differences to the baseline estimates of UK spending on children, babies, and young people from the previous analyses.

One potential concern relates to the size of the children population in each country. In particular, it could be argued that the highest spenders in the OECD are the countries with the most children. To address this concern, we collated OECD data (2023) on the size of the youth population¹¹ per country and calculated children population ratios with respect to the UK. As a result, spending on children for all benchmark countries was scaled to the corresponding number of children relative to the UK (i.e. how current spending on children among OECD top spenders would change if they had the UK's children population).

The following subsections present the three cross-sectional benchmarks and the financing implications of reaching them.

Benchmark 1: Top 5 spenders in each category

The first benchmark is constructed by calculating the average spending on children among the five highest-spending OECD countries, as described above. We then infer the implied percentage increase in UK spending on children needed to reach the average of the top five spenders.

Table 10 presents the baseline spending as a percentage of UK GDP in each of the identified areas, as well as estimates of the spending required to reach benchmark 1.

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¹¹ This dataset defines youth population as people below the age of 15.



Table 10. Baseline and target spending as a percentage of UK GDP, benchmark 1

Spending area	Baseline estimate	Benchmark 1	Demographically adjusted benchmark 1
Welfare ¹²	2.81%	3.88%	3.95%
Education	4.33%	5.44%	4.52%
Children's services and social care	0.78%	1.07%	1.09%
Health	0.65%	0.77%	0.87%
Total	8.57%	11.16%	10.43%

The UK currently spends an estimated 8.57% of its GDP on babies, children, and young people. Table 10 shows that this percentage would need to increase to 11.16% to reach benchmark 1. This represents an additional investment of approximately £58 billion to reach the average of the five biggest spenders among OECD countries.

The biggest share of the additional investment would be needed in education (an additional £25 billion) and welfare (an additional £24 billion).

As shown in the fourth column of Table 10, even if we account for differences in children's populations, the UK would need to increase its spending to 10.43% of its GDP. This would require an additional investment of almost £42 billion compared to current spending levels.

Benchmark 2: Top 10 spenders in each category

As above, we calculated the second benchmark based on OECD top spenders in each spending area. However, this benchmark includes a wider sample (top ten spenders instead of top five), offering a more representative spending target.

Table 11 presents the baseline spending as a percentage of UK GDP in each of the identified areas and the spending required to reach benchmark 2.

Table 11. Baseline and target spending as a percentage of UK GDP, benchmark 2

Spending area	Baseline estimate	Benchmark 2	Demographically adjusted benchmark 2
Welfare	2.81%	3.64%	3.76%
Education	4.33%	4.97%	4.80%
Children's services and social care	0.78%	1.01%	1.04%
Health	0.65%	0.69%	0.76%
Total	8.57%	10.31%	10.36%

¹² Increases for welfare and children's services and social care are based on differences between the UK and other OECD countries in spending on social protection which includes both direct spending on children's services and some benefits for children and families.

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The analysis presented in Table 11 shows that the UK would need to increase spending on children to 10.31% to reach benchmark 2. This represents an additional investment of approximately £39 billion compared to current levels and almost £20 billion less compared to benchmark 1. The biggest share of the additional investment would be needed in welfare (an additional £18 billion) and education (an additional £14 billion).

Similar to benchmark 1, we adjusted benchmark 2 for differences in children's population sizes among the OECD benchmark countries. The fourth column in Table 11 shows that the adjusted benchmark 2 is 10.36% of GDP. As a result, the UK would need to invest almost £40 billion additional to current spending.

Benchmark 3: Top 10 spenders overall

The third benchmark is based on the ten highest spending OECD countries across areas. Specifically, we summed the spending of each country across education, health, and social care and then ranked the countries based on the total spending as a percentage of their GDP. Then, similarly to the previous benchmarks, we calculated the average spending of the ten highest-spending countries.

The required spending to reach benchmark 3 is shown in Table 12.

Table 12. Baseline and target spending as a percentage of UK GDP, benchmark 3

Spending area	Baseline estimate	Benchmark 3	Demographically adjusted benchmark 3
Welfare	2.81%	-	-
Education	4.33%	-	-
Children's services and social care	0.78%	-	-
Health	0.65%	-	-
Total	8.57%	9.59%	9.47%

Note: Due to the nature of benchmark 3, we have not disaggregated the spending target by spending area.

As shown in Table 12, the UK would need to increase spending on children to 9.59% to reach the highest spending OECD countries. This represents an additional investment of approximately £23 billion compared to current levels and almost £35 billion less compared to benchmark 1.

As in the previous benchmarks, the fourth column in Table 12 shows the adjusted benchmark estimate. Accounting for differences in population sizes among OECD top spenders on children, the UK would need to increase spending on children to 9.47% of GDP, representing an additional investment of approximately £20 billion.



Conclusions

Outcomes of benchmark countries

The link between levels of spending and outcomes is complex, and a detailed discussion is beyond the scope of this report. That said, the section below offers some contextual information on wider population outcomes achieved by the countries used as our benchmarks. In particular, we examine how our benchmark countries perform in terms of the Human Development Index (HDI) and child well-being indicators (United Nations Development Programme, 2023; OECD, 2022).

The key takeaways are summarised in the following box, while the next sections offer additional details on our methodological approach.

Key takeaways

Compared to the median of the top ten OECD spenders as a percentage of their GDP in each of education, health, social protection, and overall, the UK:

- has lower HDI scores, representing worse outcomes in health, education, and employment.
- performs worse in material outcomes for children.
- has lower social and emotional outcome scores for children.
- achieves better physical health outcomes as well as cognitive and educational outcomes for children, despite investing less in each spending area.

Our analysis also identified evidence that increased public spending on health and education lowers under-5 mortality rate and primary education failure rate respectively.

Human Development Index

The HDI is a measure of individuals' achievement over their lifetime, incorporating health, education, and employment outcomes. For instance, it includes standards of living, life expectancy, years of schooling, and gross national income per capita. The HDI is measured from 0 to 1, with 1 representing the highest achievements possible on the scale and 0 the lowest. For example, an HDI of 1 in health represents a life expectancy of 85 years, while 0 indicates a life expectancy of 20 years (Human Development Report, 2021).

The HDI was preferred over alternative indicators as it includes comparable outcomes in the spending areas we have examined. Furthermore, it provides useful context on the wider outcomes of the countries included in our benchmarks compared to the UK. However, as the HDI is not limited to children, linking performance on HDI with children's spending could be misleading. Firstly, the inclusion of adults in the index results in a time lag in HDI performance compared to spending on children. As a result, current HDI scores reflect both concurrent expenditure on children and past expenditure on children who have now become adults. Secondly, developing countries with lower HDI scores could be deliberately investing significantly to improve their outcomes in the long run.



As shown in Table 13, the UK has significantly lower HDI scores compared to the median¹³ of the OECD highest spenders. As a result, the UK has worse outcomes compared to the top ten OECD spenders on each of education, social protection, health, and overall.

Table 13. Median HDI scores of OECD benchmark countries compared to the UK

Spending area	Median HDI of OECD top spenders ¹⁴	UK percentage difference from median OECD HDI	
Education	0.94	-0.53%	
Social protection	0.94	-0.27%	
Health	0.94	-0.85%	
Overall	0.94	-0.27%	

Note: Under the alternative benchmark (i.e. top 5 OECD spenders in each spending area), the UK would have worsened outcomes compared to the top ten benchmark, in all spending areas apart from health.

Child Well-being Dashboard

The OECD collates data on child well-being across countries, enabling policymakers to monitor progress. To that end, the dashboard presents 20 internationally comparable indicators such as the percentage of children experiencing food deprivation, being obese, experiencing bullying, and having exceptional school performance. These indicators are grouped in four core areas: (i) material outcomes; (ii) physical health outcomes; (iii) cognitive and educational outcomes; and (iv) social and emotional outcomes.

As with the HDI, we examined the outcomes achieved by the countries used as our benchmarks. We collated the latest data on child well-being outcomes for the top ten OECD spenders in children's education, social protection, health, and overall. For each spending area, we then calculated the percentage difference in each of the four core indicators of the top spending countries, compared to the UK.

As shown in Table 14, the highest spenders on children have better material outcomes compared to the UK. In particular, the ten OECD countries investing the most in education (187% better), social protection (132% better), and children overall (143%) have the best material outcomes compared to the UK. Similarly, the OECD highest spenders in each spending area have better social and emotional outcomes compared to the UK (13%-19% better outcomes).

On the other hand, the UK has better physical health outcomes compared to all benchmarks (28%-37% lower negative outcomes across spending areas) and cognitive and educational outcomes (33%-64% higher positive outcomes across spending areas), despite investing less in each spending area.

¹³ Our analysis is based on median HDI scores, given the averages are significantly skewed by the presence of outliers in the dataset.

¹⁴ The median HDI of OECD top spenders appear the same across spending areas due to rounding. The differences are small due to the fact that the benchmarks in each area include similar countries (i.e. most of top spenders in education also spend the most on social protection).



Table 14. Percentage difference of UK well-being indicators compared to OECD ten highest spenders' median, per spending area and overall

Well-being indicators		Spending areas (UK % difference compared to the top spenders)			
		Education	Social protection	Health	Overall
Negative Indicators	Material outcomes	187%	132%	88%	143%
	Physical health outcomes	-37%	-33%	-28%	-35%
Positive Indicators	Social and emotional outcomes	-19%	-14%	-13%	-15%
	Cognitive and educational outcomes	42%	43%	64%	33%

Note: The four core indicator areas are grouped in negative and positive indicators for presentational purposes. Material and physical health outcomes constitute the negative indicators, meaning a lower value represents better outcomes. Positive indicators include social and emotional outcomes, and cognitive and educational outcomes. A higher value in these outcomes is preferable.

Indicative outcomes and returns on investing in the examined spending areas

The analysis in the previous chapters suggests that UK public spending on babies, children and young people is lower than the cross-sectional benchmarks we examined. It lags behind the average expenditure on education, health, and social protection of leading OECD countries.

While an argument could be made for investing in children even if there were no positive returns, evidence from the academic literature suggests investing in education, welfare, social care and health can yield significant financial and social benefits. For instance, Rajkumar and Swaroop (2008) estimated that a 1 percentage point increase in the share of public health spending in GDP lowers the under-5 mortality rate by 0.32% in countries with good governance¹⁵, such as the UK (top 90th percentile in the 2022 corruption perceptions index; Transparency International, 2022). Similarly, a 1 percentage point increase in the share of public education spending in GDP lowers the primary education failure rate by 0.7% in countries with good governance.

The sections below present indicative policy interventions in children's social care and welfare. Additional interventions and their financing implications are included in the Appendix. The purpose of these examples is to demonstrate that there are potential interventions which additional spending could fund where there is already good academic evidence of effectiveness.

However, this section is not meant to offer policy advice or Returns on Investment (Rols) on a programme of interventions that the Government should implement. This would require significant additional analysis, beyond the scope of this report, to appraise individual policies in much more detail.

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¹⁵ In the context of this paper, good governance is defined as above average score in the corruption perceptions index.



Children's Social Care

The Independent Review of Children's Social Care recently set out a range of reforms to prevent an escalation of needs among vulnerable children, reduce the current number of children in care, and support care leavers transitioning from care to independent living. As part of this analysis, Alma Economics built a suite of Cost Benefit models, outlining key impacts of the reforms on the public sector, children and young people, and the wider society. The results suggested that investing in children's social care can yield significant returns. In particular, the proposed package of recommendations would require an investment of £2.6 billion over five years and would result in more than £5 billion in savings over ten years. The full list of proposed reforms and cost-benefit analyses can be found here.

Welfare

There is considerable evidence supporting the cost-effectiveness of increasing welfare spending for children and young people. For instance, the Independent Review has costed a number of recommendations on increasing benefits directly or indirectly affecting children, while the Joseph Rowntree Foundation (JRF) has examined child poverty and offered suggestions to alleviate its effects.

Independent Review - Providing legal aid to SGOs, CAOs, and carers considering kinship arrangements

One of the Review's recommendations on benefits was providing legal aid to carers applying for Special Guardianship Orders (SGOs) and Child Arrangement Orders (CAOs) for children who have not been previously in care. In addition, the recommendation proposes providing early independent advice to those considering kinship care and supporting carers involved in litigations with parents. The proposed policy is intended to provide additional financial incentives to carers, increasing the number and quality of available placements, thus indirectly benefiting children.

The cost of providing legal aid to new orders of SGOs and CAOs has been estimated at approximately £22 million per year, while offering early independent advice to those considering kinship care has been costed close to £1 million per year. The identified benefits of this recommendation are expected to significantly outweigh the aforementioned costs. In particular, the recommendation could save the child social care sector close to £100 million per year, equal to the current children's legal cost to services.

Poverty alleviation

A recent JRF report highlighted the extent and impact of poverty in the UK and offered cost-effective recommendations to alleviate it (JRF, 2023). For instance, incentive schemes targeted at disadvantaged young people and other long-term unemployed individuals have been proven to generate between £1,100 to £15,350 net benefits to individuals, employers, and the Exchequer. Wider poverty alleviation interventions include (i) couple counselling - generating between £8-12 for each £1 spent, (ii) Living Rent schemes offering affordable social housing and saving the UK government £5.6 billion per year (at 2011 prices), and (iii) council-funded broking services to offer affordable loans and other financial services to low-income residents – expecting to save £20 million per year.

A recent report by Action for Children (2023) also offered recommendations on policy reforms to alleviate poverty. The authors concluded that the most cost-effective policy reforms are abolishing the Two-Child Limit and increasing the Child Element of Universal Credit. Under the first proposed reform, parents would receive children support, not limited only to two children. This has been costed to £0.9 billion in total and would lift approximately 99,000 children out of poverty. Increasing the Child Element of Universal Credit by £10 a week would cost £2.2 billion per year and would raise more than 230,000 children out of poverty.



Appendix

The appendix presents two additional areas of investment that could benefit children, beyond the main scope of this report, namely health and education.

Health

There is a rich evidence base on the cost-effectiveness of public health interventions, highlighting the potential benefits of investing in this area. Masters et al. (2017) carried out a systematic review of local and national public health interventions, examining more than 2,957 papers. The authors concluded that the median Rol was 14.3 to 1, and the median cost-benefit ratio (CBR) was 8.3. Nationwide public health interventions seem to be particularly cost-effective, as the median Rol of 28 national interventions was 27.2 and the CBR was 17.5.

Public Health England (2017) has also examined the returns on public health interventions, as presented in the Health Economics: evidence resource tool. The tool offers evidence on activities in the public health grant, outlining, among other information, their CBR, the type of activity, and underlying assumptions. The tool also presents evidence on interventions targeting specifically children (0-5 years old and 5-19 years old). Indicative examples include mental health support, conduct disorder support, nursing services, and multisystemic therapies. The median CBRs of public health interventions targeted at babies, children, and young people were between £2.97 and £6.55 for every £1 spent.

Lastly, official UK government guidance on evaluations has also recognised the value of health interventions. As outlined in the HMT Green Book, improvements in patients' health should be taken into account when examining the cost-effectiveness of public health interventions. Such improvements are monetised using the value of a quality-adjusted life-year (QALY), which represents the value of one year in perfect health. According to the Green Book, the cost to generate one QALY should not exceed £15,000, while the threshold set by the National Institute for Health and Care Excellence (NICE) is £30,000. Given the latest estimate used by DHSC for the value of one QALY is £70,000 in 2020/21 prices, we should expect as a minimum a return of £70,000 for each £30,000 invested in approved public health interventions, or equivalently £2.3 for each £1 invested.

Education

There is a large academic literature on the returns to spending on education both in the UK and internationally. Better education has been associated with increased lifetime earnings, improved health outcomes, and increased social protection (Psacharopoulos, G. & Patrinos, H.A., 2018; De Neubourg et al., 2023).

The Education Endowment Foundation (EEF), the What Works Centre specialising in educational achievement interventions, has collated a large body of evidence on the impact and cost of such interventions. This includes interventions over a wide range of education stages and types, such as arts participation, mentoring, and behaviour interventions. The strongest evidence base was identified in parental engagement, phonics, and reading comprehension interventions in Key Stages 1 and 2.

An indicative example of a phonics intervention is the "Read Write Inc. Phonics and Fresh Start" trial carried out in 2016 across 131 schools in challenging circumstances, such as those in Opportunity and priority areas. The Read Write programme used phonics over 20-minute daily lessons to teach



children aged 4-9 reading and writing, while Fresh Start was targeted at children aged 9-13 who were below their expected reading age and offered daily one-hour lessons in place of or in addition to regular English lessons. The intervention (including both programmes) had an estimated cost of £186 per pupil and resulted in one additional month of progress in education compared to similar pupils not participating in the trial.

A promising reading comprehension intervention examined by EEF was "Abracadabra", involving more than 4,000 pupils across 157 schools. Abracadabra is an online interactive software aiming to develop pupils' literacy skills through decoding, fluency and comprehension age-appropriate activities. Schools participating in the pilot rolled out the programme either online or in an offline, paper form. In both cases, teachers and teaching assistants received 1.5 days of training and then delivered four 15-minute sessions per week to all Year 1 children (ages 5–6) in small groups of 4–5 pupils. The evaluators concluded that the paper form of the programme was more effective and led to an additional 2 months of educational progress compared to comparable non-participant students. The associated average cost of the paper intervention was calculated at £24.54 per pupil.



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