



A CLIMATE PROBLEM-SOLVING GENERATION

New survey material on what young people
say they need at secondary school

EXECUTIVE SUMMARY

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There is an urgent need to deliver net zero by 2050, if we are to avoid catastrophic climate change. Timelines are slipping and there is a major skills shortage for the green economy, with the UK facing a green energy skills gap of 200,000 workers.¹ There must be a step change in how the education system prepares young people for a rapidly changing world. Engaging young people meaningfully with the issues and practical solutions will motivate them to consider a green career. However, climate change education in secondary schools is largely confined to GCSE science and geography (which is optional) and there is little education about solutions. Young people mainly obtain their news from social media

and the spread of misinformation online is of increasing concern. 72% of young people aged 14-18 would welcome the opportunity to learn more about climate change in school and 68% think it should be included in all subjects.² Over half of all teachers across the UK think legislation is needed to integrate climate change and sustainability within all subject areas.³ Record numbers of young people are anxious about the climate crisis but feel powerless to do anything about it. A focus on solutions and local project-based work will give them a sense of agency. Embedding climate change across the curriculum, together with media literacy and critical thinking skills, is key to accelerating the move to net zero.

POLICY CONTEXT

The UK government have committed to reaching net zero by 2050 and the education sector plays a key role in this. Polling evidence in the UK shows there is very strong concern about climate change and sustainability across all population demographics. The Public Attitudes Tracker on climate change (Summer 2024) shows levels of concern have remained consistently high, despite a slight drop since COP26.⁴ A YouGov poll (February 2023) shows young people aged 16-24 are more likely than other age groups to say they are currently very worried about climate change and its effects.⁵

The Department for Education (DfE) launched their sustainability and climate change strategy in April 2022 with a number of proposals, including establishing a National Education Nature Park and introducing a new optional GCSE in Natural History from 2025.⁶ However, many youth organisations argue that this does not go far enough in addressing the issues. Climate change education remains marginalized and generally taught in subject silos. Geography made up only 5% of all subject entries in England in 2022 (Geographical Association, 2022).⁷ GCSE Triple Science covers the topic in greater depth than Double Science, but this tends to be mostly offered in fee-paying schools. The Curriculum and Assessment Review provides an opportunity to address the problem.

RESEARCH AIMS

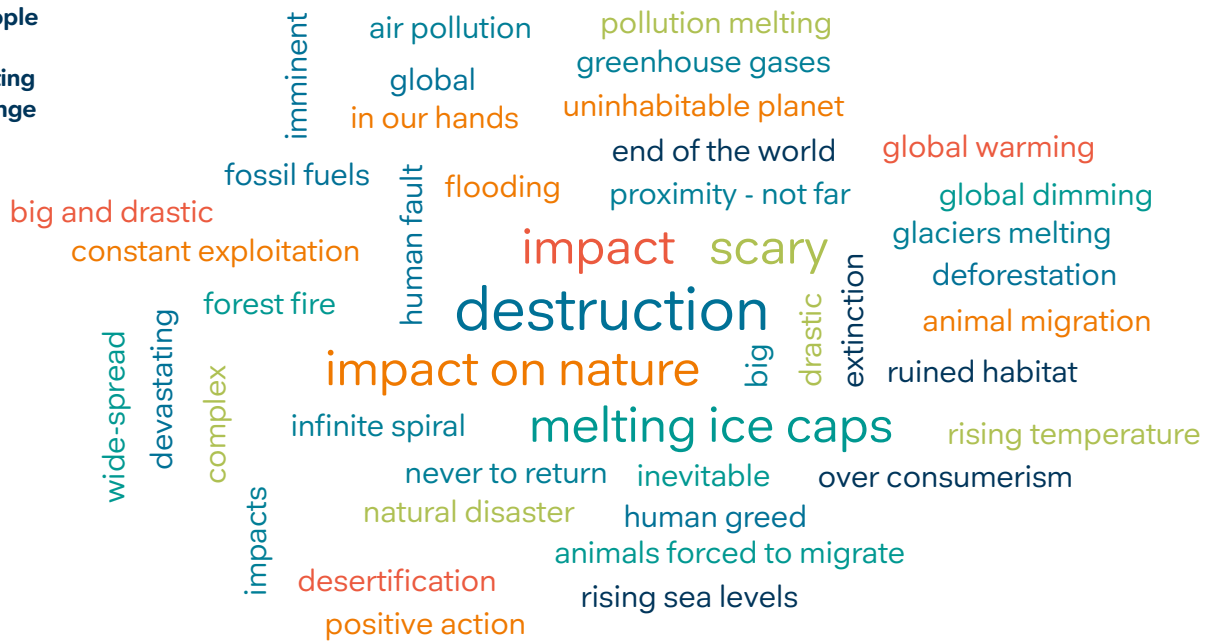
- To investigate young people's views on their experience of climate education in secondary schools.
- To examine young people's level of knowledge about climate change and identify their main sources of information.
- To explore the best ways of engaging young people in climate education.
- To assess the level of teacher support for legislation being introduced to embed climate change education across the curriculum.

RESEARCH FINDINGS

- The research, undertaken in 2023 in conjunction with the British Science Association, involved an online survey of 1,000 young people across the UK and two follow up workshops.
- Young people aged 14–18 consistently identify climate change as their top concern. However only 1 in 4 felt 'very informed' on climate change and for 14-year-olds this was only 1 in 14.
- Climate change education is confined to subject 'silos' within GCSE geography and science. Teaching in 'subject silos' is disjointed and presents a confusing narrative.
- 72% of the young people surveyed said they would welcome the opportunity to learn more about climate change in school.
- 68% felt that climate change education should be included in all subjects.
- Young people feel that the climate education they received focussed narrowly on impacts and very rarely covered solutions, encouraging them to feel hopeless and powerless.
- When participants were requested to choose and describe an image representing what climate change means to them just over half selected images portraying catastrophic destruction/extreme pollution. Only one chose an image portraying possible solutions
- A University of Plymouth survey (Teacher Tapp, February 2023) found that more than half of all teachers across the UK think that legislation is needed to integrate climate change and sustainability within all subject areas in an interdisciplinary fashion. Two thirds of respondents in their 20s agreed legislation needs to be introduced.



Words young people used to describe images representing what climate change means to them



Thinking about your school education, to what extent do you agree or disagree with the following statements?

My teachers are/were very knowledgeable about climate change



The climate change information I get/got at school is/was relevant to my life



Climate change should be taught in and across all subjects



I think climate change education at school is good



I would/would have welcome(d) the opportunity to learn more about climate change in school



0% 20% 40% 60% 80% 100%

● Agree ● Neither Agree nor Disagree ● Disagree ● Don't Know



KEY MESSAGES

- Climate change education needs to be embedded across the secondary curriculum.
- Education needs to be more solutions focused with an emphasis on media literacy and critical thinking skills.
- Teachers need to be provided with more support, training and resources if there is to be a step-change in climate education.



POLICY IMPLICATIONS

- Climate change education should be embedded in all (compulsory and non-compulsory) subjects to engage pupils in meaningful dialogue.
- The DfE should introduce specific measurable targets to track the implementation and success of the Sustainability and Climate Change strategy and allocate ring-fenced funding to support climate action in schools.
- There should be an emphasis on solutions, including a focus on critical thinking and media literacy. Young people need to be given a sense of agency and empowered to take up green careers. A project-led approach, rooted in experiential learning locally relevant to the student, should be adopted.

REFERENCES

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The Research Team: The University of Plymouth is a leading, award-winning University for sustainability. The Sustainable Earth Institute carries out research into some of the most pressing 21st century sustainability challenges. We work with local, regional, national and international partners across a range of complex issues, applying our research to help mitigate challenges and develop solutions.

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