

Planetary Health Report Card (Medicine):

University of Buckingham



2024-2025 Contributing Team:

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Summary of Findings

Overall Grade

С Curriculum С UoB does not have a Planetary Health (PH) module within the curriculum. However, PH is incorporated into various modules throughout Phase 1, such as "Respiratory System," "Gastrointestinal System," "Health and Disease in Society," "Health, Psychology and Diversity" and "Health and Disease in Population." PH has also been incorporated in the student selected component called "Global Health." Recommendations: UoB needs to put in effort to include PH in the cardiovascular and reproductive health modules in phase I. **Interdisciplinary Research** C Despite being a teaching focused institute, the faculty and students at UoB are carrying out research with a focus on PH. The university has also established an occupational and environmental health department, a sustainability strategy group and a faculty group for PH. UoB is a member of the Global Consortium on Climate Health Education. **Recommendations:** UoB needs to establish an interdisciplinary department for planetary health research. There should also be a university website to access ongoing and past research related to health and environment. **Community Outreach and Advocacy** B-UoB has maintained multiple in-person and online courses and talks regarding planetary health. The university has demonstrated strong collaborations with multiple community organisations during the climate sustainability awareness month. Milton Keynes University Hospital also has educational and accessible information for patients regarding climate change. **Recommendations**: More community facing courses and events multiple times a year focusing on PH and sustainability. Communication updates should be sent regularly relating to planetary health and should include information about community partnerships and SSC. **Support for Student-Led Initiatives** С UoB encourages student-led initiatives though societies like the environmental society and student council so student voices can be heard. But there is limited formalised support and resources for long term student led sustainability projects and promotion could be improved to increase student involvement. **Recommendations**: Support for student-led initiative through a dedicated sustainability fund and improve communication so awareness can be raised for existing student led sustainability opportunities. **Campus Sustainability** D-UoB has reduced energy consumption with LED lighting upgrades, water saving measures and recycling initiatives. Although the sustainability measures seem fragmented with limited targets for carbon neutrality, for example, with

Recommendations: Expand recycling facilities and improve signage to encourage recycling compliance and increase transparency by regularly publishing progress reposts on campus sustainability goals.

lab spaces and inconsistent promotion of campus-wide green practices.

Statement of Purpose

Planetary health is human health.

The Planetary Health Alliance describes planetary health as "a solutions-oriented, transdisciplinary field and social movement focused on analysing and addressing the impacts of human disruptions to Earth's natural systems on human health and all life on Earth." This definition is intentionally broad, intended to encompass the multitude of ways that the environment can affect health, including water scarcity, changing food systems, urbanisation, biodiversity shifts, natural disasters, climate change, changing land use and land cover, global pollution, and changing biogeochemical flows. The health of humanity is dependent on our environment, and our environment is changing rapidly and in disastrous ways. Although the World Health Organization has called climate change "the greatest threat to global health in the 21st century," many medical school's institutional priorities do not reflect the urgency of this danger to human health.

As future health professionals, we must be prepared to address the impacts of human-caused environmental changes on our patients' health. This preparation is in the hands of the institutions providing our medical training. It is imperative that we hold our institutions accountable for educating medical students about the health impacts of climate change and other anthropogenic environmental changes, generating research to better understand health impacts and solutions, supporting related student initiatives, embracing sustainable practices as much as possible, and engaging with surrounding communities that are most affected by environmental threats. Because climate change and environmental threats disproportionately affect vulnerable populations (for example, communities of colour, older adults sensitive to health threats, and individuals in low-resource settings), these issues are inherently ones of equity and justice.

With the purpose of increasing planetary health awareness and accountability among health professional schools, we have created a Planetary Health Report Card that students internationally can use to grade and compare their institutions on an annual basis. This student-driven initiative aims to compare health professional schools nationally and internationally on the basis of discrete metrics in five main category areas: 1) planetary health curriculum, 2) interdisciplinary research in health and environment, 3) university support for student planetary health initiatives, and 4) community outreach centred on environmental health impacts 5) medical school campus sustainability.

Planetary Health Curriculum

Section Overview: This section evaluates the integration of relevant planetary health topics into the medical school curriculum. Today's medical students will be on the frontlines of tackling the health effects of climate and other environmental changes. Therefore, it is critical that medical students are trained to understand the health effects of these changes, as well as planetary health issues and principles more broadly. Topics like the changing geography of vector-borne diseases, the health consequences of air pollution, environmental health inequities, and disaster response principles must be part of every medical school's core curriculum.

Curriculum: General

1.1. Did your <u>medical school</u> offer elective courses (student selected modules) to engage students in Education for Sustainable Healthcare or Planetary Health in the last year?

Yes, the medical school has offered **more than one** elective whose primary focus is ESH/planetary health in the past year. (3 points)

Yes, the medical school has offered **one** elective whose primary focus is ESH/planetary health in the past year. (2 points)

The medical school does **not** have any electives whose primary focus is ESH/planetary health, but there are one or more electives that include a **lecture** on planetary health. (1 points)

No, the medical school has **not** offered any electives on planetary health or electives that include ESH/planetary health topics in the past year. (0 points)

Score Assigned:

2 points

In 2024, the University of Buckingham offered one student selected module that was related to ESH/planetary health. This module was global health. The global health module encompassed learning about the impacts of climate change and sustainability in the face of humanitarian crises caused by natural disasters and health inequalities within developing nations. This module was organised well to include guest speakers who advised the students on humanitarian work, activities/group work centred around sustainability and healthcare, and lastly presentations whereby students prepared a pitch for a grant on what they deem to be the most important resource (e.g. water) in disaster response and relief.

In 2025, the University of Buckingham is offering one student selected module called "One Health: Connecting Global Practice for Better Health." This is a two week course which will discuss the health of humans, animals, and the environment and their impact on global health altogether.

Curriculum: Health Effects of Climate Change

1.2. Does your <u>medical school</u> curriculum address the relationship between extreme heat, health risks, and climate change?

This topic was explored in depth by the core curriculum. (3 points)

This topic was briefly covered in the core curriculum. (2 points)

This topic was covered in elective coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

2 points

At the University of Buckingham, there is a module called "Health and Disease in Society," in Year 2, where students discuss the challenges faced by refugees in refugee camps in Lebanon during group work. Some of the topics discussed included the detrimental impact of climate change on these refugees, and what could be done by health workers to improve their situation. The discussion was based on this video: <u>https://www.youtube.com/watch?v=b_2JktYJcbY</u> Furthermore, in 2024, the University of Buckingham addressed the relationship between extreme heat, health risks, and climate change in the Global health student selected component.

1.3. Does your <u>medical school</u> curriculum address the impacts of extreme weather events on individual health and/or on healthcare systems?

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was briefly covered in the core curriculum. (2 points)

This topic was covered in elective coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

2 points

At the University of Buckingham, there is a module called "Health and Disease in Society," in Year 2, where students discuss the challenges faced by refugees in refugee camps in Lebanon during group work. Some of the topics discussed included the detrimental impact of climate change on these refugees, and what could be done by health workers to improve their situation. The discussion was based on this video: <u>https://www.youtube.com/watch?v=b_2JktYJcbY</u>

1.4. Does your <u>medical school</u> curriculum address the impact of climate change on the changing patterns of infectious diseases?

This topic was explored **in depth** by the **core** curriculum. (3 points)

This topic was **briefly** covered in the **core** curriculum. (2 points)

This topic was covered in **elective** coursework. (1 point)

This topic was **not** covered. (0 points)

Score Assigned:

2 points

At the University of Buckingham, there is a module called "Health and Disease in Society," in Year 2, where students discuss the challenges faced by refugees in refugee camps in Lebanon during group work. Some of the infectious diseases discussed were COVID-19, influenza, UTIs and how their spread could change depending on the changing climate conditions. The discussion was based on this video: <u>https://www.youtube.com/watch?v=b_2JktYJcbY</u>

1.5. Does your <u>medical school</u> curriculum address the respiratory health effects of climate change and air pollution?

This topic was explored in depth by the core curriculum.

This topic was briefly covered in the core curriculum.

This topic was covered in elective coursework.

This topic was **not** covered.

Score Assigned:

2 points

The impact of air pollution as a risk factor for non-communicable diseases, COPD, and asthma are discussed in various modules, such as "Health and Disease in Population," "Respiratory system" and "Health and Disease in Society."

1.6. Does your <u>medical school</u> curriculum address the cardiovascular health effects of climate change, including increased heat

This topic was explored in depth by the core curriculum.

This topic was briefly covered in the core curriculum.

This topic was covered in **elective** coursework.

This topic was **not** covered.

Score Assigned:

0 points

No, the medical school curriculum does not address the cardiovascular health effects of climate change, including increased heat.

1.7. Does your <u>medical school</u> curriculum address the mental health and neuropsychological effects of environmental degradation and climate change?

This topic was explored in depth by the core curriculum.

This topic was **briefly** covered in the **core** curriculum.

This topic was covered in elective coursework.	
This topic was not covered.	
Score Assigned: 2 points	
At the University of Buckingham, there is a module called "Health and Disease in Society," in Year 2, where students discuss the challenges faced by refugees in refugee camps in Lebanon during group work. Some of the topics discussed included the mental health and neuropsychological effects of environmental degradation and climate change on the refugees. The discussion was based on this video: https://www.youtube.com/watch?v=b_2JktYJcbY	

1.8. Does your <u>medical school</u> curriculum address the relationships between health, individual patient food and water security, ecosystem health, and climate change?

This topic was explored in depth by the core curriculum.

This topic was briefly covered in the core curriculum.

This topic was covered in elective coursework.

This topic was **not** covered.

Score Assigned:

3 points

At the University of Buckingham, there is a module called "Health and Disease in Society," in Year 2, where students discuss the challenges faced by refugees in refugee camps in Lebanon during group work. Some of the topics covered in these discussions included food and water security, ecosystem health and climate change. The discussion was based on this video: https://www.youtube.com/watch?v=b_2JktYJcbY

This is also covered in the "Gastrointestinal system." Students were tasked to create posters about planetary health and how diet could impact not only an individual's health, but also the planet's health. These posters were then displayed throughout the campuses.

Also, in 2024, the University of Buckingham medical school curriculum addressed the relationships between health, individual patient food and water security, ecosystem health, and climate change in the global health student selected component in Phase II.

1.9. Does your <u>medical school</u> curriculum address the outsized impact of climate change on marginalised populations such as those with low SES, women, communities of colour, Indigenous communities, children, homeless populations, and older adults?

This topic was explored in depth by the core curriculum.

This topic was **briefly** covered in the **core** curriculum.

This topic was covered in **elective** coursework.

This topic was **not** covered.

Score Assigned:	2 points
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At the University of Buckingham, there is a module called "Health and Disease in Society," in Year 2, where students discuss the challenges faced by refugee camps in Lebanon during group work. Some of the topics covered in these discussions included food and water security, ecosystem health and climate change. The discussion was based on this video: https://www.voutube.com/watch?v=b_2JktYJcbY

Furthermore, the University of Buckingham medical school's curriculum addresses the outsized impact of climate change on marginalised populations such as those with low SES, women, communities of colour, Indigenous communities, children, homeless populations, and older adults in the "Health & Disease in Society" and the "Health, Psychology & Diversity" modules in Phase I.

1.10. Does your <u>medical school</u> curriculum address the unequal regional health impacts of climate change globally?

This topic was explored in depth by the core curriculum.

This topic was **briefly** covered in the **core** curriculum.

This topic was covered in **elective** coursework.

This topic was **not** covered.

Score Assigned:

2 points

The curriculum at University of Buckingham briefly addressed the unequal health impacts of climate change globally in the module, "Health and Disease in Society" where it discussed the health inequalities in relation to impacts on maternal health. The session used a recent case study that had been shown in UK media to discuss this topic during the lectures for that week. Furthermore, in 2024, the University of Buckingham medical school's curriculum addressed the unequal regional health impacts of climate change globally in the global health student selected component in Phase II.

Curriculum: Environmental Health & the Effects of Anthropogenic Toxins on Human Health

1.11. Does your medical school curriculum address the reproductive health effects of
industry-related environmental toxins (e.g. air pollution, pesticides)?This topic was explored in depth by the core curriculum.This topic was briefly covered in the core curriculum.This topic was covered in elective coursework.This topic was not covered.Score Assigned:0 pointsNo, the medical school curriculum does not address the reproductive health effects of
industry-related environmental toxins.

1.12. Does your <u>medical school</u> curriculum address important human-caused environmental
threats that are relevant to the university's surrounding community?

This topic was explored in depth by the core curriculum.

This topic was **briefly** covered in the **core** curriculum.

This topic was covered in **elective** coursework.

This topic was **not** covered.

Score Assigned:

0 points

No, the medical school curriculum does not address important human-caused environmental threats that are relevant to the university's surrounding community.

1.13. To what extent does your <u>medical school</u> emphasise the importance of Indigenous knowledge and value systems as essential components of planetary health solutions?

This topic was explored **in depth** by the **core** curriculum.

This topic was briefly covered in the core curriculum.

This topic was covered in elective coursework.

This topic was **not** covered.

Score Assigned:

1 point

In 2024, the University of Buckingham medical school emphasised the importance of indigenous knowledge, as well as, the value systems as essential components of planetary health solutions in the global health student selected component in phase II.

1.14. Does your <u>medical school</u> curriculum address the outsized impact of anthropogenic environmental toxins on marginalised populations such as those with low SES, women, communities of colour, children, homeless populations, Indigenous populations, and older adults?

This topic was explored in depth by the core curriculum.

This topic was **briefly** covered in the **core** curriculum.

This topic was covered in elective coursework.

This topic was **not** covered.

Score Assigned:	2 points
2, where students discuss the challenges faced by	ncluded food and water security, ecosystem health

https://www.youtube.com/watch?v=b_2JktYJcbY

Curriculum: Sustainability

1.15. Does your <u>medical school</u> curriculum address the environmental and health co-benefits of a plant-based diet?

This topic was explored in depth by the core curriculum.

This topic was briefly covered in the core curriculum.

This topic was covered in elective coursework.

This topic was **not** covered.

Score Assigned:

2 points

The University of Buckingham medical school's curriculum addressed the environmental and health co-benefits of a plant-based diet in the gastrointestinal module in Phase I during group work.

1.16. Does your <u>medical school</u> curriculum address the carbon footprint of healthcare systems?

This topic was explored in depth by the core curriculum.

This topic was **briefly** covered in the **core** curriculum.

This topic was covered in **elective** coursework.

This topic was **not** covered.

Score Assigned:

2 points

Score

The University of Buckingham addressed the carbon footprint of healthcare systems in the "Respiratory system." module. During the lecture on asthma treatment, students discussed the use of inhalers prescribed by doctors and how this contributes to the NHS carbon footprint.

1.17. Does your <u>medical school</u> curriculum cover these components of sustainable	
clinical practice in the <u>core</u> curriculum? (points for each)	

The health and environmental co-benefits of avoiding over-medicalisation, over-investigation and/or over-treatment (2 points)	2
The environmental impact of pharmaceuticals and over-prescribing as a cause of climate health harm. Alternatively teaching on deprescribing where possible and its environmental and health co-benefits would fulfil this metric. (2 points).	2
The health and environmental co-benefits of non-pharmaceutical management of conditions where appropriate such as exercise or yoga classes for type 2 diabetes; social group activities such as gardening for mental health conditions; active transport such as bicycle schemes. This is commonly known as social prescribing in the UK. (1 point)	1
Environmental impact of surgical healthcare on planetary health and the climate crisis, and how can it be mitigated. (1 point)	1
The impact of anaesthetic gases on the healthcare carbon footprint and ways to reduce anaestheisa's environmental impacts, such as total intravenous anaesthesia or choosing less environmentally harmful anaesthetic gas options with reduced greenhouse gas emissions. (1 point)	1
The impact of inhalers on the healthcare carbon footprint and the environmental benefit of dry powdered inhalers over metered dose inhalers. (1 point)	1
Waste production within healthcare clinics and strategies for reducing waste in clinical activities (e.g. single use items in the inpatient or outpatient setting) (1 point)	1
 -In our Pharmacology theme the environmental impact of over-prescribing and over treatment are incorporated into the work across our Phase 2 blocks. -Further work in ward-based learning looks at waste production whilst our perioperative block has key learning objectives looking at the environmental impact of surgery. -Additionally, the University of Buckingham addressed the carbon footprint of healthcare systems in the "Respiratory system." module. During the lecture on asthma treatment, students discussed the 	

use of inhalers prescribed by doctors and how this contributes to the NHS carbon footprint.

Curriculum: Clinical Applications

1.18. In training for patient encounters, does your <u>medical school's</u> curriculum introduce strategies to have conversations with patients about the health effects of climate change?

Yes, there are strategies introduced for having conversations with patients about climate change in the **core** curriculum. (2 points)

Yes, there are strategies introduced for having conversations with patients about climate change in **elective** coursework. (1 points)

No, there are **no** strategies introduced for having conversations with patients about climate change. (0 points)

Score Assigned:

0 points

No, the medical school's curriculum does not introduce strategies to have conversations with patients about the health effects of climate change.

1.19. In training for patient encounters, does your <u>medical school's</u> curriculum introduce strategies for taking an environmental history or exposure history?

Yes, the core curriculum includes strategies for taking an environmental history. (2 points)

Only **elective** coursework includes strategies for taking an environmental history. (1 point)

No, the curriculum does **not** include strategies for taking an environmental history. (0 points)

Score Assigned:	2 points
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During phase 1 at the University of Buckingham, students were taught how to take a full history, which included questions regarding patient's social life (e.g. has the patient travelled recently, has the patient been exposed to chemical through their work, does the patient or anyone around the patient smokes) in Clinical Skills foundation course. This course ran all six semesters in Phase 1 and students were expected to take a full history for patients at their hospital and GP placements, as well as with simulated patients at university.

Curriculum: Administrative Support for Planetary Health

1.20. Is your <u>medical school</u> currently in the process of implementing or improving Education for Sustainable Healthcare (ESH)/planetary health education?		
Yes, the medical school is currently in the process of making major improvements to ESH/planetary health education. (4 points)		
Yes, the medical school is currently in the process of making minor improvements to ESH/planetary health education. (2 points)		
No, there are no improvements to planetary health education in progress. (0 points)		
Score Assigned:	2 points	
The University of Buckingham medical school is in the process of making minor improvements to ESH/planetary health education by integrating planetary health within the various core curriculum modules in phase 1. Some of these modules include "Health and Disease in Society,"		

"Gastrointestinal system," and "Health and Disease in Populations.".

1.21. How well are the aforementioned planetary health/Education for Sustainable Healthcare topics integrated longitudinally into the <u>core</u> curriculum?

Planetary health/ESH topics are **well integrated** into the core medical school curriculum. (6 points)

Some planetary health/ESH topics are appropriately integrated into the core medical student curriculum. (4 points)

Planetary health/ESH is not integrated and is primarily addressed in (a) standalone lecture(s). (2 points)

There is **minimal/no** education for sustainable healthcare. (0 points)

Score Assigned:

2 points

There are some planetary health/ESH topics that are appropriately integrated into the core medical student curriculum, as seen in the respiratory system and the gastrointestinal system.

1.22. Does your <u>medical school</u> employ a member of faculty to specifically oversee and take responsibility for the incorporation of planetary health and sustainable healthcare as a theme throughout the course?

Yes, the **medical school** has a specific faculty/staff member responsible for overseeing curricular integration of planetary health and sustainable healthcare. (1 point)

No, the **medical school** does **not** have a specific faculty/staff member responsible for overseeing curricular integration of planetary health and sustainable healthcare. (0 points)

Score Assigned:

1 point

The medical school has a specific faculty responsible for overseeing the curricular integration of planetary health and sustainable healthcare, for example the phase 1 lead and module leads.

Section Total (39 out of 72)

54%

Interdisciplinary Research

Section Overview: This section evaluates the quality and quantity of interdisciplinary planetary health research at the broader institution. Interactions between health and the environment are complex and multifactorial. While climate change has been extensively studied from an environmental science perspective, planetary health is an emerging field. As leading health institutions with talented researchers and research resources, institutions should fund research studying the health effects of climate change and anthropogenic environmental toxins. This obligation is particularly strong because the public and policymakers are more attentive to climate change when its implications for human health are emphasised.

2.1. Are there researchers engaged in planetary health research and healthcare sustainability research at your <u>institution</u>?

Yes, there are faculty members at the **institution** who have a **primary** research focus in planetary health **or** sustainable healthcare/vetcare. (3 points)

Yes, there are individual faculty members at the **institution** who are conducting research **related** to planetary health or healthcare sustainability, OR are part of a national/international sustainability working group, but it is not their primary research focus. (2 points)

There are sustainability researchers at the **institution**, but not specifically associated with healthcare/vetcare. (1 point)

No, there are **no** planetary health and/or sustainability researchers at the **institution** at this time. (0 points)

Score Assigned:

2 points

The University of Buckingham is a teaching focused institution, however some Faculty members led educational research together or with student projects with a focus on planetary health including the Faculty mentors associated with the PHRC. This includes the impact of curriculum changes on perspectives and understanding of early years medical students on the role of healthcare in planetary health and a poetry scheme for school age children to think about healthcare sustainability and climate change. These works are not yet published outside of the institution.

2.2. Is there a dedicated department or institute for interdisciplinary planetary health research at your <u>institution</u>?

There is **at least one** dedicated department or institute for interdisciplinary planetary health research. (3 points)

There is **not currently** a department or institute for interdisciplinary planetary health research, but there are **plans** to open one in the next 3 years. (2 points)

There is an **Occupational and Environmental Health department**, but no interdisciplinary department or institute for planetary health research. (1 points)

There is no dedicated department or institute. (0 points)	
Score Assigned:	1 point
There is a dedicated occupational and environmental health departments, however there is no interdisciplinary department for planetary health research.	

2.3. Is there a process by which communities disproportionately impacted by climate change and environmental injustice give input or make decisions about the research agenda at your <u>institution</u>?

Yes, there is a process in which community members impacted by climate and environmental injustice have **decision-making power** in the climate + environmental research agenda. (3 points)

Yes, there is a process in which community members impacted by climate and environmental injustice **advise** the climate + environmental research agenda. (2 points)

No, but there are **current efforts** to establish a process for community members to advise or make decisions on the research agenda. (1 points)

There is **no** process, and **no** efforts to create such a process. (0 points)

Score Assigned:

1 point

At the University of Buckingham, there is an established Sustainability Strategy Group and also a faculty group which are looking at how to work with local communities to impact change. One of the current focuses of the faculty group has been led from interaction and feedback from a local community group.

2.4. Does your <u>institution</u> have a planetary health website that centralises ongoing and past research related to health and the environment?

There is an **easy-to-use**, **adequately comprehensive** website that **centralises** various campus resources related to health and the environment including all of the following: upcoming events, leaders in planetary health at your institution, and relevant funding opportunities. (3 points)

There is a website that **attempts to centralise** various campus resources related to health and the environment, but it is hard-to-use, not updated, or not adequately comprehensive. (2 points)

The **institution** has an **Office of Sustainability website** that includes **some** resources related to health and the environment. (1 point)

There is **no** website. (0 points)

Score Assigned:

0 points

Currently there is no website.

2.5. Has your <u>institution</u> recently hosted a conference or symposium on topics related to planetary health?

Yes, the **institution** has hosted at least one conference or symposium on topics related to planetary health in the past year. (4 points)

Yes, the **institution** has hosted at least one conference or symposium on topics related to sustainable healthcare/vetcare in the past year. (3 points)

Yes, the **institution** has hosted a conference on topics related to planetary health / sustainable healthcare/vetcare in the past three years. (2 points)

The **institution** has not hosted any conferences directly, but they have provided financial support for a local planetary health event. (1 point)

No, the **institution** has not hosted a conference on topics related to planetary health in the past three years. (0 points)

Score Assigned:

3 points

The Law School within the University of Buckingham hosted a conference last year on sustainability healthcare.

2.6. Is your <u>institution</u> a member of a national or international planetary health or E	SH/ESV
organisation?	

Yes, the institution is a member of a national or international planetary health **or** ESH/ESV organisation. (1 points)

No, the institution is **not** a member of such an organisation. (0 points)

Score Assigned:

1 point

The University of Buckingham is a member of the Global Consortium on Climate Health Education.

The URL is:

https://www.publichealth.columbia.edu/research/programs/global-consortium-climate-health-education/european-network-climate-health-education-enche

Section Total (8 out of 17)

47%

Community Outreach and Advocacy

<u>Section Overview:</u> This section evaluates medical school engagement in community outreach and advocacy efforts associated with planetary health. Researching and teaching planetary health is necessary but not sufficient. It is critical that institutions also directly engage with communities most affected by environmental health harms. Although climate change is a problem largely created by those with power and resources, its impacts fall disproportionately on under-resourced populations and communities of colour. Institutions should partner with local communities affected by climate change and pollution to share information about environmental health threats, advocate together for change, and provide opportunities for students to be a part of this work.

3.1. Does your <u>institution</u> partner with community organisations to promote planetary and health?

Yes, the **institution** meaningfully partners with **multiple** community organisations to promote planetary and environmental health. (3 points)

Yes, the **institution** meaningfully partners with **one** community organisation to promote planetary and environmental health. (2 points)

The **institution** does not partner with community organisations, but has participating in community focused events relating to planetary health. (1 point)

No, there is **no** such meaningful community partnership. (0 points)

Score Assigned:	e Assigned:
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3 points

The University of Buckingham partners with multiple communitary organisations to promote environmental health, especially during Climate Sustainability Awareness Month, where interactive events engage both students and the local community.

https://www.buckingham.ac.uk/news/fclp-climate-sustainability-awareness-month-campaign-report

The Buckingham Sustainable Enterprise Unit also works closely with different organisations to ensure sustainable business practices, reinforcing further community environmental efforts. <u>https://www.buckingham.ac.uk/business/bseu</u>

The university's broader collaborative partnership also reflects its commitment to sustainability through joint initiatives that benefit academic and local communities. https://www.buckingham.ac.uk/about-buckingham/collaborations/

3.2. Does your <u>institution</u> offer community-facing courses or events regarding planetary health?

The institution offers community-facing courses or events at least once every year. (3 points)

The **institution** offers courses or events open to the community at least once per year, but they are not primarily created for a community audience. (2 points)

The **institution** has promoted community-facing courses or events, but was not involved in planning those courses or events. (1 point)

The **institution/medical school** have not offered such community-facing courses or events. (0 points)

Score Assigned:

0 points

At present, no courses are run by the University of Buckingham. There isn't a specific focus on planetary health or events.

3.3. Does your <u>institution</u> have regular coverage of issues related to planetary health and/or sustainable healthcare in university update communications?

Yes, all students **regularly** receive communication updates dedicated to planetary health and/or sustainable healthcare. (2 points)

Yes, planetary health and/or sustainable healthcare topics are regularly included in communication updates to **some courses**. (1 point)

Students **do not** receive communications about planetary health or sustainable healthcare. (0 points)

Score Assigned:

1 point

In 2024, the information about student selected components which included Global Health were detailed in the Patient Involvement Forum newsletter which was available to PIF members from the local community as well as faculty and students.

Furthermore, the university has posted on social media posters created by students discussing the topic of doctors recommending plant based diets for both individual and planetary health to their patients, an activity which formed part of group work in their core gastrointestinal curriculum teaching

3.4. Does the <u>institution</u> or <u>main affiliated hospital trust</u> engage in professional education activities targeting individuals post graduation with the aim of ensuring their knowledge and skills in planetary health and sustainable healthcare remain up to date during their professional career?

Yes, the **institution** or **main affiliated hospital trust** offers multiple in-person or online courses relating to planetary health and/or sustainable healthcare for post-graduate providers, including at least one with a primary focus of planetary health. (2 points)

Yes, the **institution** or **main affiliated hospital trust** offers one course relating to planetary health and/or sustainable healthcare for post-graduate provider. (1 point)

There are **no** such accessible courses for post-graduate providers. (0 points)

Score Assigned:	2 points
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Students entering phase 2 are required to do an online training course by affiliated hospitals which looks at sustainable healthcare and the importance of a doctors role in this through their prescribing. Furthermore, Milton Keynes University Hospital (MKUH) has a "Green Plan" which outlines sustainable healthcare practices and changes within the hospital environment to educate students and staff.

The URL is:

https://www.mkuh.nhs.uk/about-us/green-plan/read-our-mkuh-green-plan

MKUH also provides a section overview on the current projects they have implemented across the Trust.

The URL is:

https://www.mkuh.nhs.uk/about-us/green-plan/green-plan-current-projects

Lastly, as part of our initiation into MKUH, students are expected to complete modules on the ESR e-learning platform which are in line with hospital guidelines and policies. Some modules such as Occupational Health and Safety, Fire Safety, Staff Wellbeing, and Equality and Diversity include minor sustainability practices through means of infection control, appropriate waste disposal and recycling, patient education and awareness, and workplace education and awareness

3.5. Does your <u>institution</u> or its <u>affiliated teaching hospitals</u> have accessible educational materials for patients about environmental health exposures?

Yes, the **medical school** or <u>all</u> affiliated hospitals have accessible educational materials for patients. (2 points)

Some affiliated hospitals have accessible educational materials for patients. (1 point)

No affiliated medical centres have accessible educational materials for patients. (0 points)

Score Assigned:

2 points

Affiliated hospitals have material which is available for patients about environmental health exposures. These are available on the MKUH website under "our green plan" section. Furthermore, there are several clinicians who have QI projects running in MKUH which aim to reduce the NHS carbon footprint that students can get involved in. These are advertised via emails sent out to students placed at the hospital or on flyers around the hospital. https://www.mkuh.nhs.uk/about-us/green-plan

3.6. Does your <u>institution</u> or its <u>affiliated teaching hospitals</u> have accessible educational
materials for patients about the health impacts of climate change?

Yes, the **medical school** or <u>all</u> affiliated hospitals have accessible educational materials for patients. (2 points)

Some affiliated hospitals have accessible educational materials for patients. (1 point)

No affiliated hospitals have accessible educational materials for patients. (0 points)

Score Assigned:

1 point

Yes, Milton Keynes University Hospital (MKUH) - the affiliated hospital with Buckingham University provides educational and accessible materials for patients about climate change and health impacts. For example, the Trust provides information about inhaler recycling and how to carry out its disposal properly.

https://www.mkuh.nhs.uk/about-us/green-plan/inhalers-environmentally-friendly-disposal Since MKUH is part of the wider Bedfordshire NHS Trust, there is also a sustainability section they provide: https://www.bedfordshirehospitals.nhs.uk/corporate-information/sustainability/ whereby, they outline a variety of green initiatives such as Food and Nutrition, Lighting, and Waste Management in which staff, students, patients, and volunteers can participate in. Unfortunately, Buckingham Medical School does not have accessible educational materials for patients at this point in time.

Section Total (9 out of 14)

64%

Support for Student-Led Planetary Health Initiatives

Section Overview: This section evaluates institutional support for student-led planetary health initiatives, such as funding, fellowships, programming, and student groups. Planetary health is a young field and, as young people facing a future deeply shaped by climate change, students are often some of the first at an institution to engage with it. Institutions should provide support for students to engage in sustainability quality improvement (QI) initiatives, discover mentors in their area of interest, and receive funding for planetary health projects.

4.1. Does your <u>institution</u> offer support for students interested in enacting a sustainability initiative/QI project?

Yes, the **institution** *either* offers grants for students to enact sustainability initiatives/QI projects *or* sustainability QI projects are part of the core curriculum. (2 points)

The **institution** encourages sustainability QI projects (to fulfil clerkship or longitudinal requirements) and offers resources to help students succeed in these projects, **but** there is no student funding available and there is no requirement to participate. (1 point)

No, **neither** the medical school or the institution offer opportunities or support for sustainability initiatives or QI projects. (0 points)

Score Assigned:

1 point

The medical school is still new to implementing sustainability QI projects within the campus and there isn't any funding put aside for these projects to be carried out. However, Milton Keynes and Stoke Mandeville hospital (the affiliated organization for clinical placements) offers many opportunities to partake in sustainability led QI projects. The MKUH trust has green initiatives implemented throughout the hospital so student involvement is encouraged.

.2. Does your institution offer opportunities for students to do research related to planeta	ary
ealth and/or sustainable healthcare/vetcare?	

The **institution** has a **specific** research program or fellowship for students interested in doing planetary health/sustainable healthcare/vetcare research. (2 points)

There are research opportunities for students to perform research related to planetary health/sustainable healthcare, but these **require student initiative** to seek these out and carry them out in their spare time. (1 point)

There are **no opportunities** for students to engage in planetary health/sustainable healthcare research. (0 points)

Score Assigned:

1 point

During year 3 (phase 2), there is a chance for students to do their own student selected component which could include planetary health and sustainable healthcare. Unfortunately there are no research programs or fellowships.

4.3. Does the <u>institution</u> have a webpage where students can find specific information related to planetary health and/or sustainable healthcare/vetcare activities and mentors within the institution? For example, projects achieved, current initiatives underway at the medical school and/or contact of information of potential mentors.

The institution has a webpage with specific information related to planetary health or sustainable healthcare/vetcare that includes up-to-date information on relevant initiatives and contact information of potential mentors. (2 points)

There is an institution webpage that features some information on projects and mentors within planetary health and sustainable healthcare within the medical school, but it lacks key information. (1 point)

There is **no institution** specific webpage for locating planetary health and/or sustainable healthcare projects or mentors. (0 points)

Score Assigned:

1 point

There is a Sustainability Strategy Group which was established in 2024. It aims to develop a sustainability culture at the university.

https://uniofbuck.sharepoint.com/sites/SPO-StudentGateway/SitePages/Sustainability-Champions------we-need-you!.aspx

4.4. Does your <u>institution</u> have registered student groups dedicated towards fostering a culture of planetary health engagement, scholarship, and advocacy on campus, supported by faculty advisors?

Yes, there is a student organisation **with faculty support** at my medical school dedicated to planetary health or sustainability in healthcare. (2 points)

Yes, there is a student organisation at my medical school dedicated to planetary health or sustainability in healthcare but it **lacks faculty support.** (1 point)

No, there is **not** a student organisation at my institution dedicated to planetary health or sustainability in healthcare. (0 points)

Score Assigned:

2 points

The University of Buckingham has established the "Faculty of Medicine Staff and Student Sustainability Group," where the University strategy contains a pledge to achieve Net Zero by 2050 or sooner.

https://uniofbuck.sharepoint.com/sites/SPO-StudentGateway/SitePages/Sustainability-Champions------we-need-you!.aspx

4.5. Is there a student liaison representing sustainability interests who serves on a department

<u>or institutional</u> decision-making council to advocate for curriculum reform and/or sustainability best practices?

Yes, there is a student representative that serves on a department or institutional decision-making council/committee. (1 points)

No, there is no such student representative. (0 points)

Score Assigned:

1 point

The current medical student representative driving the PHRC is Laiyba Wasim and Anfaal Khan (Phase 2 students) The aim is to grow on this to make a student-led group and incorporate students from both pre-clinical and clinical years to carry it in the years moving forward.

4.6. In the past year, has the <u>institution</u> had one or more co-curricular planetary health programs or initiatives in the following categories? (1 point each)	
Projects where students are able to gain experience in organic agriculture and sustainable food systems, such as gardens, farms, community supported agriculture (CSA), fishery programs, or urban agriculture projects.	0
Panels, speaker series, or similar events related to planetary health that have students as an intended audience.	1
Events in which students learn directly from members of a local environmental justice community about the climate and environmental challenges they face, and how health professionals can partner with their community to address these exposures and impacts.	0
Cultural arts events, installations or performances related to planetary health that have students as an intended audience.	
Local volunteer opportunities related to building community resilience to anthropogenic environmental impacts.	
Wilderness or outdoors programs (e.g., that organise hiking, backpacking, kayaking, or other outings for students)	0
In the year 2024, a panel of speakers were invited to give talks related to aspects of planetary at the Phase II Global Health student selected component.	y health

Section Total (7 out of 15)

Campus Sustainability

Section Overview: This section evaluates the support and engagement in sustainability initiatives by the institution. The healthcare industry is a major contributor to greenhouse gas emissions as well as pollution that harms local, regional, and global ecosystems. While healthcare is, by nature, a resource-intensive endeavour, the healthcare sector is well poised to lead the world to a more sustainable future. This will involve scrutinising every aspect of how our systems operate, from where we source our energy, to how we build our infrastructure, to what companies we invest in. Our medical schools, clinics, and hospitals must set the standard for sustainable practices, and show other sectors what is possible when it comes to minimising environmental impact.

5.1. Does your <u>institution</u> have an Office of Sustainability?

Yes, there is an Office of Sustainability with multiple full-time staff dedicated to campus sustainability. If the Office of Sustainability serves the entire campus, there is **at least one designated staff member** for sustainability at the hospital. (3 points)

There is an Office of Sustainability with one or more full-time staff dedicated to campus sustainability, but **no specific staff member** in charge of hospital sustainability. (2 points)

There are **no salaried sustainability staff**, but there is a sustainability task force or committee. (1 point)

There are **no** staff members **or** task force responsible for overseeing campus sustainability. (0 points)

Score Assigned:

1 point

There is a Buckingham Sustainable Enterprise Unit at the University of Buckingham. <u>https://www.buckingham.ac.uk/business/bseu</u>

5.2. How ambitious is your <u>institution's</u> plan to reduce its own carbon footprint?		
The institution has a written and approved plan to achieve carbon neutrality by 2030 (5 points)		
The institution has a written and approved plan to achieve carbon neutrality by 2040 (3 points)		
The institution has a stated goal of carbon neutrality by 2040 but has not created a plan to reach that goal or the plan is inadequate (1 point)		
The institution/medical school does not meet any of the requirements listed above (0 points)		
Score Assigned:	0 points	
The University of Buckingham has undertaken initiatives like the Climate Sustainability Awareness Month to educate and engage the community on sustainability issues. There is a plan available that details a commitment to achieve carbon neutrality by 2050. However, it is not public.		

https://www.buckingham.ac.uk/news/fclp-climate-sustainability-awareness-month-campaign-report

https://uniofbuck.sharepoint.com/sites/SPO-STR/_layouts/15/AccessDenied.aspx?Source=https%3 A%2F%2Funiofbuck%2Esharepoint%2Ecom%2Fsites%2FSPO%2DSTR&correlation=781084a1 %2Df031%2Db000%2D8f84%2D4cdbc66c421c

5.3. Do buildings/infrastructure used by the institution for teaching (not including the hospital) utilize renewable energy?

Yes, institution buildings are 100% powered by renewable energy. (3 points)

Institution buildings source >80% of energy needs from off-site and/or on-site renewable energy. (2 points)

Institution buildings source >20% of energy needs from off-site and/or on-site renewable energy. (1 point)

Institution buildings source <20% of energy needs from off-site and/or on-site renewable energy. (0 points)

Score Assigned:

0 points

The University of Buckingham medical school buildings source <20% of energy needs from off-site energy.

5.4. Are sustainable building practices utilised for new and old buildings on the <u>institution's</u> campus, with design and construction of new buildings and remodelling of old buildings conforming to a published sustainability rating system or building code/guideline?

Yes, sustainable building practices are utilised for new buildings on the institution's campus and the **majority** of old buildings **have been retrofitted** to be more sustainable. (3 points)

Sustainable building practices are utilised for new buildings on the institution's campus, but most old buildings have **not been retrofitted.** (2 points)

Sustainable building practices are **inadequately or incompletely** implemented for new buildings. (1 point)

Sustainability is **not considered** in the construction of new buildings. (0 points)

Score Assigned:	Score	Assig	ned:
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2 points

The University of Buckingham incorporates sustainable practices in the design of new buildings. However, most older buildings have not been retrofitted to meet modern sustainability standards. 5.5. Has the <u>institution</u> implemented strategies to encourage and provide environmentally-friendly transportation options for students and reduce the environmental impact of commuting?

Yes, the institution has implemented strategies to encourage and provide **environmentally-friendly transportation options** such as safe active transport, public transport, or carpooling and these options are well-utilised by students. Alternatively, the campus location is not amenable to unsustainable forms of transportation by default. (2 points)

The institution has implemented **some** strategies to provide environmentally-friendly transportation options, but the options are **unsatisfactorily** accessible or advertised. (1 point)

The institution has **not** implemented strategies to encourage and provide environmentally-friendly transportation options. (0 points)

2 points

The University of Buckingham encourages students to share transport, provide alternative transportation methods such as public transport to and from some curriculum engagements. <u>https://www.buckingham.ac.uk/life/buck/getting</u>

Bicycle parking facilities are available on campus, with designated cycle routes connecting key locations.

The narrative medicine module is now completely "online," students contact their patient via communication technologies such as phone reducing commuting needs.

5.6. Does your <u>institution</u> have an organics recycling program (compost) and a conventional recycling program (aluminium/paper/plastic/glass)?

Yes, the institution has **both** compost **and** recycling programs accessible to students and faculty. (2 points)

The institution has **either** recycling **or** compost programs accessible to students and faculty, but not both. (1 point)

There is **no** compost or recycling program at the medical school. (0 points)

2 points

The University of Buckingham medical school does have compost and recycling programs accessible to students and faculty. The company that manages waste is Grundon and it also recycles.

https://www.grundon.com/

5.7. Does the <u>institution</u> apply sustainability criteria when making decisions about the campus food and beverage selections (e.g. local sourcing, reduced meat, decreased plastic packaging)?

Yes, the institution has a**dequate s**ustainability requirements for food and beverages, including meat-free days or no red-meat, and **is engaged** in efforts to increase food and beverage sustainability. (3 points)

There are sustainability guidelines for food and beverages, but they are **insufficient or optional**. The institution **is engaged** in efforts to increase food and beverage sustainability. (2 points)

There are sustainability guidelines for food and beverages, but they are **insufficient or optional**. The institution is **not** engaged in efforts to increase food and beverage sustainability. (1 point)

There are **no** sustainability guidelines for food and beverages. (0 points)

Score Assigned:

0 points

There are no sustainability guidelines for food and beverages at the University of Buckingham medical school.

5.8. Does the <u>institution</u> apply sustainability criteria when making decisions about supply procurement?

Yes, the institution has **adequate** sustainability requirements for supply procurement **and** is **engaged** in efforts to increase sustainability of procurement. (3 points)

There are sustainability guidelines for supply procurement, but they are **insufficient or optional**. The institution is **engaged** in efforts to increase sustainability of procurement. (2 points)

There are sustainability guidelines for supply procurement, but they are **insufficient or optional**. The institution is **not engaged** in efforts to increase sustainability of procurement. (1 point)

There are **no** sustainability guidelines for supply procurement. (0 points)

Score Assigned:

0 points

The University of Buckingham medical school has no sustainability guidelines for supply procurement.

5.9. Are there sustainability requirements or guidelines for events hosted at the institution?		
Every event hosted at the institution must abide by sustainability criteria. (2 points)		
The institution strongly recommends or incentivizes sustainability measures, but they are not required. (1 point)		
There are no sustainability guidelines for institution events. (0 points)		
Score Assigned:	0 points	
	-	

There are no sustainability guidelines for medical school events at the University of Buckingham medical school.

5.10. Does your <u>institution</u> have programs and initiatives to assist with making lab spaces
more environmentally sustainable?

Yes, the institution has **programs** and **initiatives** to assist with making lab spaces more environmentally sustainable. (2 points)

There are **guidelines** on how to make lab spaces more environmentally sustainable, but not programs or initiatives. (1 point)

There are **no** efforts at the institution to make lab spaces more sustainable. (0 points)

Score Assigned:

0 points

The University of Buckingham medical school has put no efforts into making lab spaces more sustainable.

5.11. Does your institution's endowment portfolio investments include fossil-fuel companies?

The institution is **entirely divested** from fossil fuels **and** has made a **commitment to reinvest divested funds** into renewable energy companies or renewable energy campus initiatives. (4 points)

The institution is entirely divested from fossil fuels. (3 points)

The institution has **partially divested** from fossil fuel companies **or** has made a **commitment to fully divest**, but **currently** still has fossil fuel investments. (2 points)

The institution has **not divested** from fossil-fuel companies, but faculty and/or students are **conducting organised advocacy** for divestment. (1 point)

Yes, the institution has investments with fossil-fuel companies and there have been **no efforts** to change that. (0 points)

Score Assigned:

0 points

The University of Buckingham endowment portfolio investments include fossil-fuel companies.

Section Total (7 out of 32)

22%

Grading

Section Overview

This section focuses on the grading of the report card. The institution received a grade for each of the individual sections as well as an overall institutional grade. Section point totals were tallied, divided by the total points available for the section, and converted to a percentage. The overall institutional grade is a weighted average of the section grades, with curriculum receiving a higher weight owing to its larger number of metrics. Letter grades for each section and the institution overall were then assigned according to the table below.

Letter Grade*	Percentage
А	80% - 100%
В	60% - 79%
С	40% - 59%
D	20% - 39%
F	0% - 19%

*Within each grade bracket, a score in the top 5% ($_5$ to $_9$ %), receives a "+", and a score in the bottom 5% ($_0$ - 4%) receives a "--". For example, a percentage score of 78% would be a B+.

Planetary Health Grades for the University of Buckingham School of Medicine

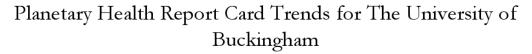
The following table presents the individual section grades and overall institutional grade for the University of Buckingham School of Medicine on this medical-school-specific Planetary Health Report Card.

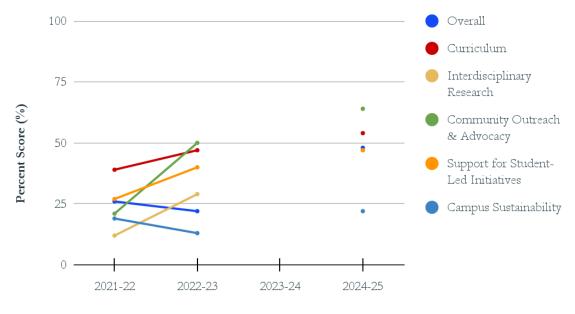
Section	Raw Score %	Letter Grade
Planetary Health Curriculum (30%)	$(39/72) \ge 100 = 54\%$	С
Interdisciplinary Research (17.5%)	(8/17) x 100 = 47%	С
Community Outreach and Advocacy (17.5%)	(9/14) x 100 = 64%	B-
Support for Student-led Planetary Health Initiatives (17.5%)	(7/15) x 100= 47%	С
Campus Sustainability (17.5%)	(7/32) x 100 = 22%	D-
Institutional Grade	(54% x 0.3 + 47% x 0.175 + 64% x 0.175 + 22% x 0.175) = 47.7%	С

Report Card Trends

Section Overview

This graph demonstrates trends in overall and section grades for the years in which The University of Buckingham medical school has participated in the Planetary Health Report Card initiative.





Academic Year