



IMPACT OF FOOD AND BEVERAGE

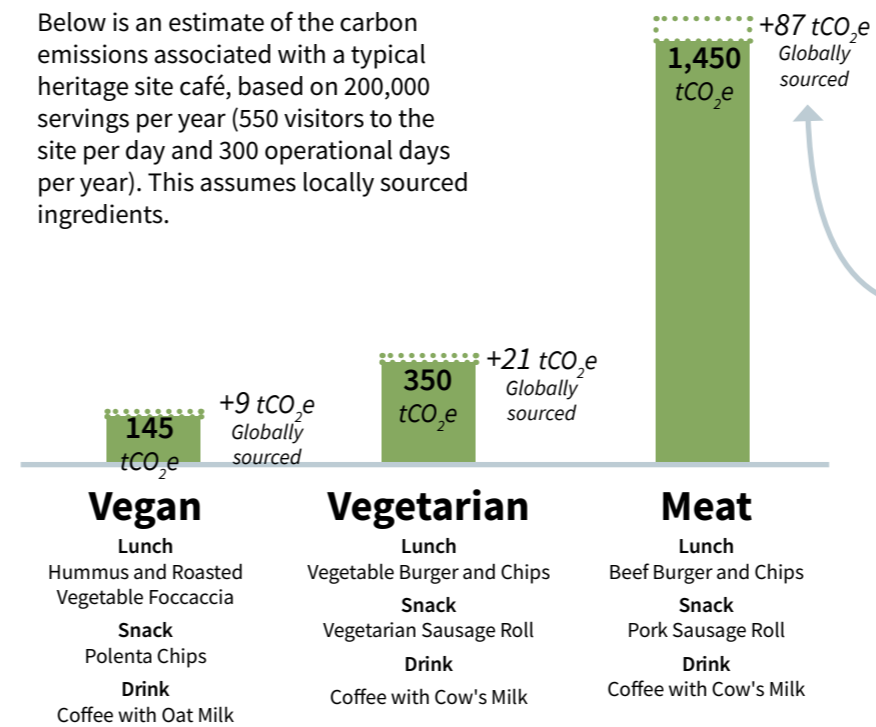
Context

A large proportion of heritage sites offer some sort of Food and Beverage (F&B) offer and the menu options that are offered can have a **significant impact on carbon emissions**. Here we show the impact of three different menu options including a Meat, Vegetarian and Vegan based menu showing the potential impacts of increasing the vegan and vegetarian options available.



Impact of menu options for a cafe

Below is an estimate of the carbon emissions associated with a typical heritage site café, based on 200,000 servings per year (550 visitors to the site per day and 300 operational days per year). This assumes locally sourced ingredients.



Local vs Global

Whilst the emissions associated with the transport of food varies from product to product (mainly depending on its country of origin and its shelf life, determining the travel mode), these typically only represent a small proportion of the footprint of overall food emissions. However on average, emissions from globally-sourced food are approximately 6% higher than the equivalent locally-sourced food [3].

Menu

Drinks

Carbon Emissions per serving [1]

Coffee with Oat Milk (Vg)	136 gCO ₂ e
Coffee with Cow's Milk (Vg)	440 gCO ₂ e

Cakes

Chocolate brownie (Vg)	70 gCO ₂ e
Chocolate brownie (V)	200 gCO ₂ e

Snacks

Polenta Chips (Vg)	250 gCO ₂ e
Vegetable sausage roll (V)	520 gCO ₂ e
Pork sausage roll	860 gCO ₂ e

Lunches

Hummus and roasted vegetable foccacia (Vg)	340 gCO ₂ e
Beetroot and walnut salad (Vg)	430 gCO ₂ e
Bean burger and Chips (Vg)	630 gCO ₂ e
Pasta salad (V)	420 gCO ₂ e
Courgette quiche (V)	550 gCO ₂ e
Veggie burger and Chips (V)	770 gCO ₂ e
Chicken Caesar salad	1,100 gCO ₂ e
Beef Burger and chips	5,950 gCO ₂ e


6x Beetroots
= The co2e equivalent of


100g small chunk
of cheddar [2]

How F&B providers can influence carbon

1. Encourage increased consumption of vegan and vegetarian food and drink and reduced consumption of meat and dairy, e.g. through ordering of menus, or communicating carbon benefits.
2. Increase the proportion of locally-sourced food and drink, compared to globally-sourced.
3. Consider the farms and land use changes (i.e. avoid areas of the world where farming is contributing to deforestation.)

References

1. My Emissions Ltd. (2023) 'Free food carbon footprint calculator'. Available at: <https://myemissions.green/food-carbon-footprint-calculator/> (Accessed: 1-15 March 2024).
2. Berners-Lee, M. (2020) How Bad Are Bananas?: The carbon footprint of everything - 2020 new edition. Profile Books Ltd.
3. Sandstrom, V., Valin, H. and Krisztin, T. et al. (2018) 'The role of trade in the greenhouse gas footprints of EU diets', Global Food Security, 19, 48-55. Available at: <https://doi.org/10.1016/j.gfs.2018.08.007> (Accessed: 1-15 March 2024).