





Measuring your carbon footprint and the impact of your procurement on the local economy

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&

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Guidance

Streamlined Energy and Carbon Reporting (SECR) for academy trusts

Updated 4 August 2021

Sustainable procurement: the Government Buying Standards (GBS)

GBS product specifications: mandatory for central government departments and related organisations; encouraged for wider public sector.

New plan for food procurement encourages UK government to buy local

With billions spent on food for catering, the government is attempting to redefine what constitutes value for money



National
Food Strategy
Independent Review

THE PLAN.

INTEGRATING SOCIAL VALUE IN GOVERNMENT PROCUREMENT

Session hosted by:



Crown
Commercial
Service



Cabinet Office

Procurement Policy Note – National
Procurement Policy Statement

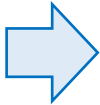
Action Note PPN 05/21

June 2021

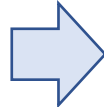
CARBON EMISSIONS?



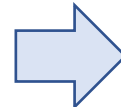
**AGRICULTURAL
PRODUCTION**



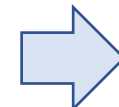
**FOOD
PROCESSING &
WAREHOUSING**



**DOWNSTREAM
TRANSPORT**



**KITCHEN &
CANTEEN**

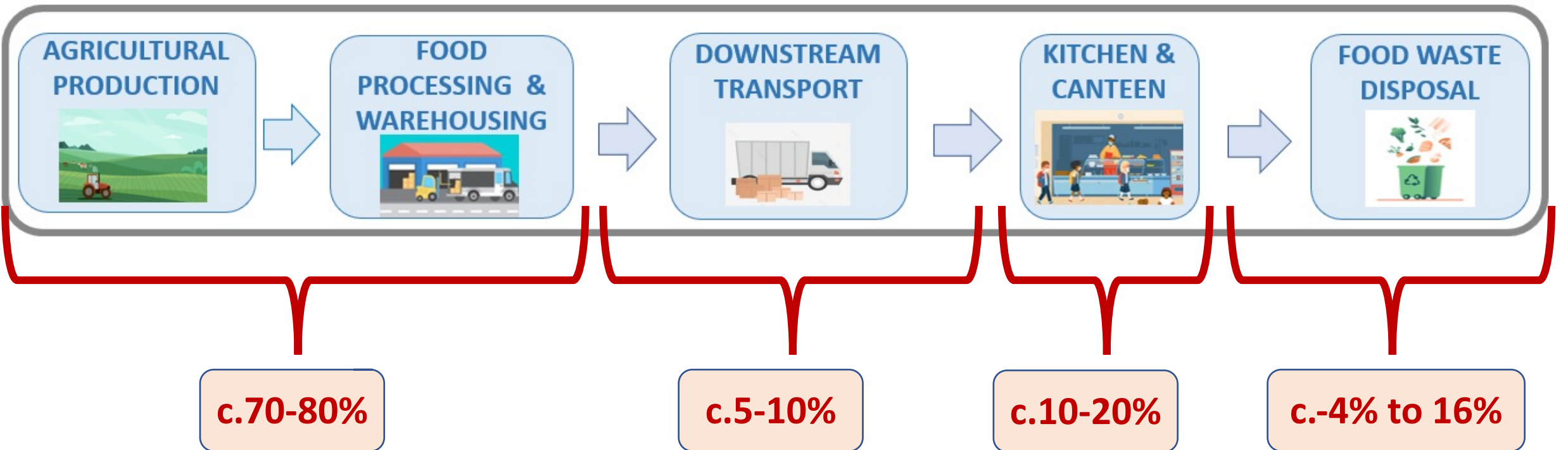


**FOOD WASTE
DISPOSAL**

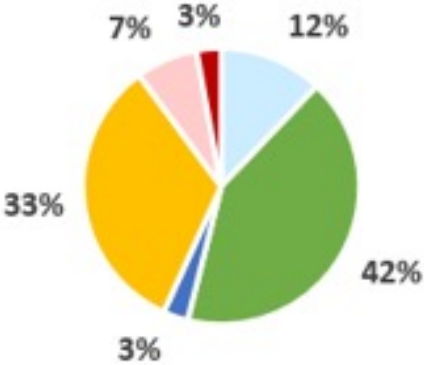


**LOCAL ECONOMIC
IMPACT?**

CARBON EMISSIONS?



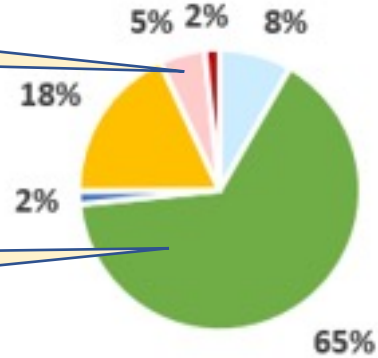
LACA/ASSIST FM Members: Foods purchased (kgs) and their emissions (kgs CO₂e per kg food)



Average **2.51**

High % poultry

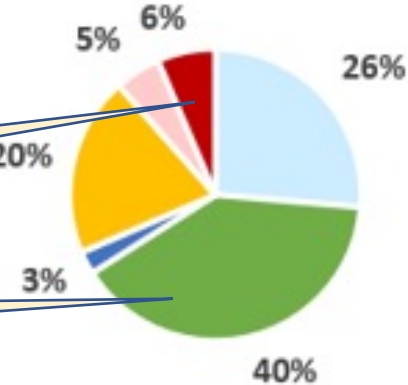
High % raw f&v



Lowest case **1.59**

High % pure-bred beef

Low % raw f&v

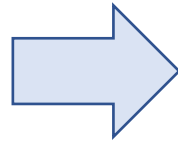


Highest case **3.82**

Dairy Fruit&Veg Fish Grocery Other Meat Red Meat

Implications for Achieving Net Zero?

If sector average is
CURRENT AVERAGE
(2.51 kgsCO₂e/kg food)

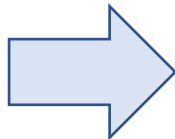


Total annual emissions
= 684,447 tonnes CO₂e



~114,000 ha woodland
~150,000 ha peatland
COST = ~£13.7m p/a

If sector average is
LOWEST CASE
(1.59 kgsCO₂e/kg food)

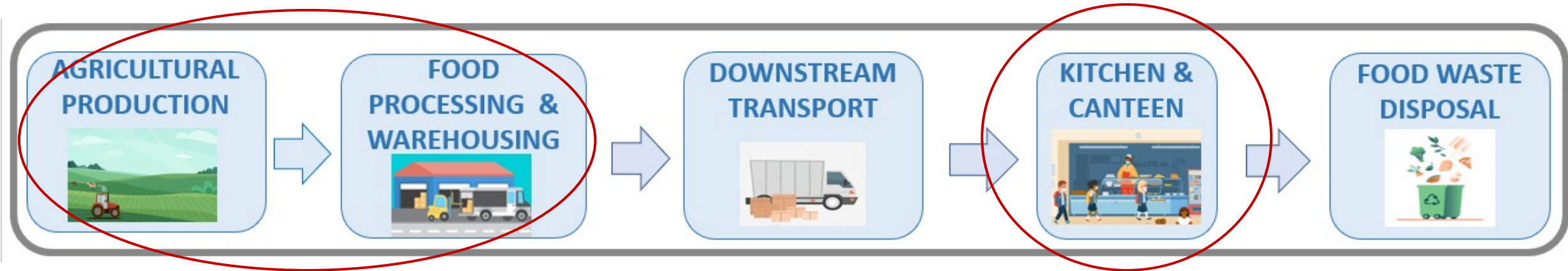


Total annual emissions =
433,574 tonnes CO₂e



~72,000 ha woodland
~90,000 ha peatland
COST = ~£8.7m p/a

And what about local economic impact...?



Budget spent on local suppliers

Catering Service 1 23%

Catering Service 2 5%

Budget spent on (local) staff

Catering Service 1 44%

Catering Service 2 64%

About your Food Procurement

In order to measure the carbon footprint of your procurement, we need to know about which foods you buy, and in what quantities. For an average week of total food procured for your meals service. Please estimate the percentages falling into each of the categories below.

Currency

GBP £

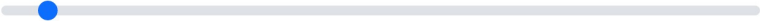
Red Meat



2

Includes beef and lamb only

Other Meat



5

Includes pork, poultry and any other meats

Dairy



8

Includes milk, butter, cheese, yoghurt etc

Fruit And Vegetables



65

Includes potatoes, salads, etc

Fish



2

Groceries



18

Includes all bread, pasta, rice, cereals, flour, oils/spreads, ready made sauces and seasonings

1 Week weight by %

100

(should total 100) For an average week of food procured for this school meals service, please estimate the percentages falling into each of the categories above. Categories include both fresh and processed items

Please estimate the average weight of a meal in your service, in grams

590

Please estimate the average number of meals provided by your service, per week

336365

Number of weeks in the year meals produced

38

Enter 52 if meals service is all year

Environment

Please estimate, for an average week, what proportion of food served is plate waste?



26

(optional, if not known we will use a default value). In an average week, what proportion of food served is plate waste?

Please indicate the destination of your waste

Digester, composting, and/or animal f

About your budget

In order to measure the local economic impact of your meals service, we need to know about your local area and where your budget is spent.

Choose your local area Somerset

Budget in £

773639

Percent Budget Spent On Local Staff



Percent Budget Spent With Local Suppliers



Balance **not** spent with Local Suppliers or Staff



This is usually the area from which is considered local by students or suppliers

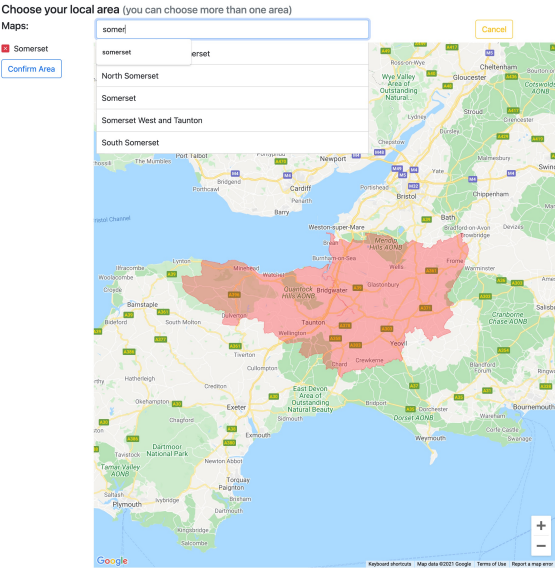
Annual school food Budget including staff and suppliers

25 The % of total budget spent on staff who live within the local area

34 The % of total budget spent with suppliers who are based within the local area

41 The % balance of your budget that is left after the first 2 questions

100 (should total 100)

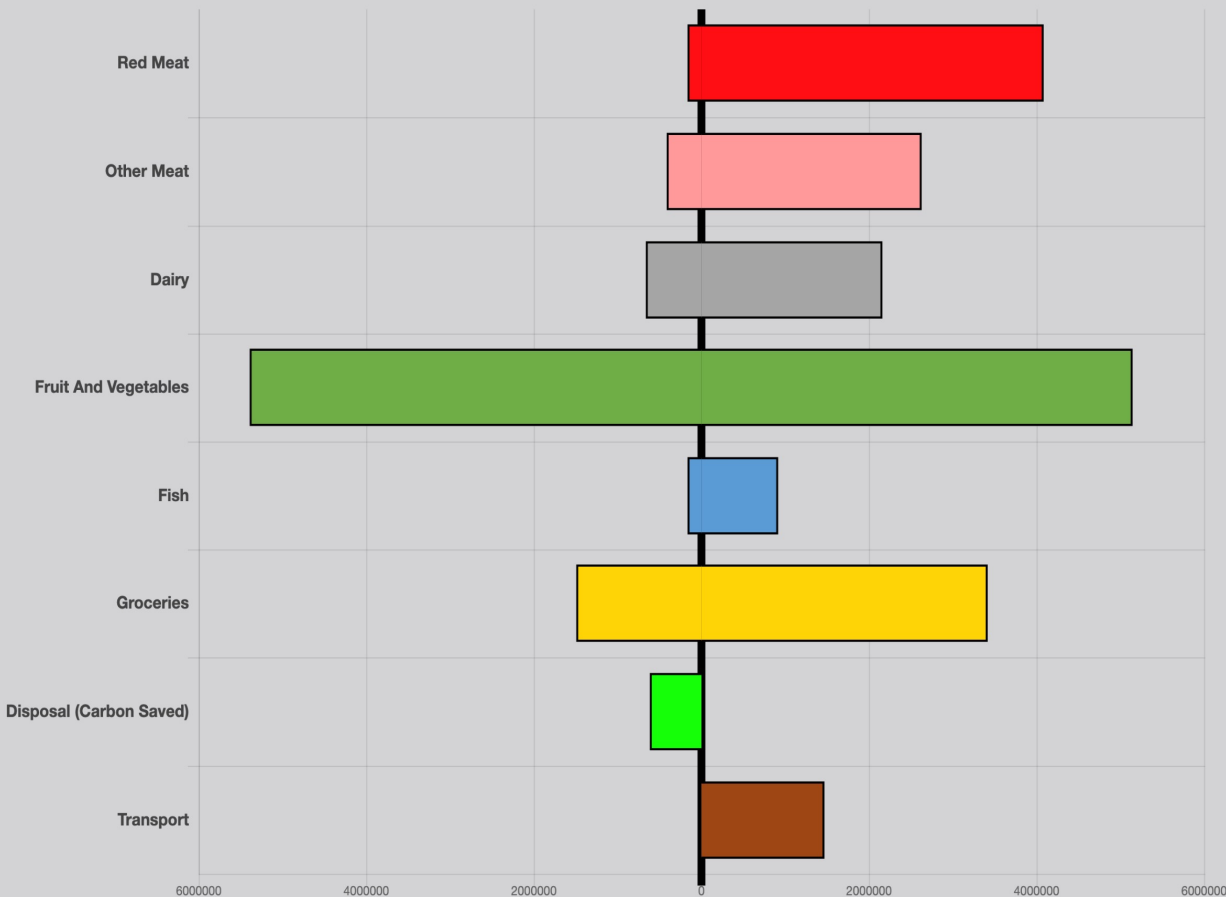


Your Food Weight & Carbon Emissions

Hover over the bars to show per annum, per meal, % of total

Food (kgs)

CO₂e (kgs)



* Based on 38 weeks in the year meals produced.

Total food weight: 8,295,434 kgs, total emissions: 19,205,102 kgs CO₂e, 1.50 kgs CO₂e per meal

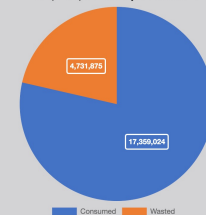
Key Points

- Red meat is only 2% of your food weight, but 21.3% of your total emissions
- Other meat is 5% of your food weight, but only 13.7% of your total emissions
- Fruit and Vegetables are 65% of your food weight, but only 26.8% of your total emissions
- Transport is 7.6% of your total emissions, far less than emissions to produce the food
- Waste disposal has **reduced your total emissions by 3.2%**, because you used a digester. If you used landfill, it would **increase** your total emissions by 12.54%.

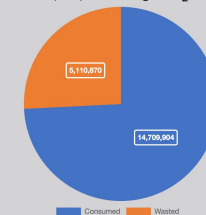
How are these carbon emissions calculated?

What is the Impact of your Plate Waste?

The financial cost of your plate waste is £4,731,874.61 per annum



The embodied carbon in your plate waste is 5,110,869.75 kgs CO₂e



* This does not include the carbon cost of waste disposal

Key Points

- The financial cost of your wasted food is £4,731,874.61 per annum, or 27.26% of the total cost of your procured food
- The embodied carbon in your wasted food is 5,110,869.75 kgs CO₂e per annum, or 25.79%

How are these impacts calculated?

How Do Your Total Carbon Emissions Compare?

Total emissions per meal (kgs CO₂e)

Your Emissions	1.32
Average for your sector	to be added as data accumulated

Total emissions per kg of food procured (kgs CO₂e)

Your Emissions	2.32
Average for your sector	to be added as data accumulated

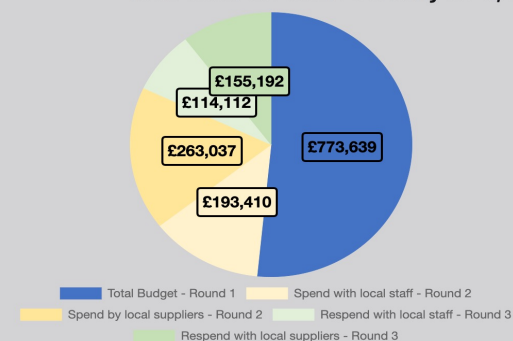
Key Points

- Your emissions total per meal is 1.32 kgs CO₂e, which is (higher/lower) than the average for your sector
- Your emissions total per kg of food procured is 2.32 kgs CO₂e, which is (higher/lower) than the average sector
- "Emissions per kg of food procured" is a better comparative measure, because it takes account of variations in average meal weights
- Note: higher/lower will be enabled as data is accumulated

Local Economic Impact - Somerset

LM3 Analysis by Staff, Supplier and Spending Round.

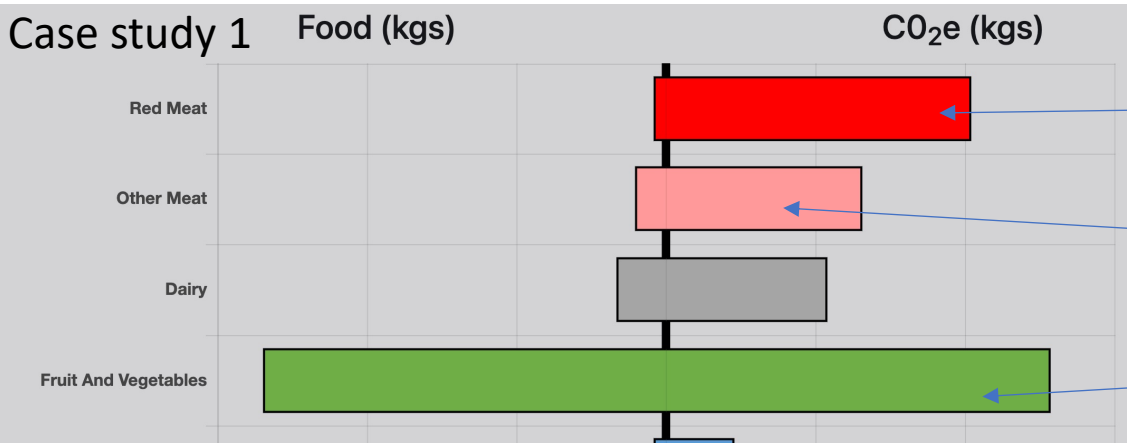
Total value to Local Economy is £1,499,390 and every £ spent generates £1.94



Key Point

- Use of local staff to produce meals is as important as using local suppliers

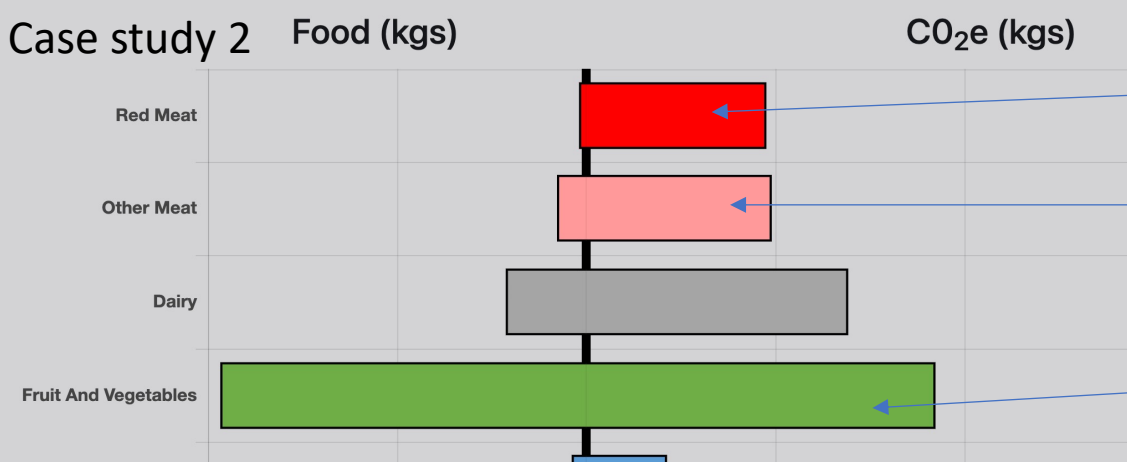
How is LM3 calculated?



Red meat is only 2% of weight, but 21.3% of emissions

Other meat is 5% of weight, but 13.7% of emissions

Fruit and Veg are 65% of weight, but only 26.8% of emissions



Red meat is only 1% of weight, but 10.5% of emissions

Other meat is 4% of weight, but 10.8% of emissions

Fruit and Veg are 50% of weight, but only 20.4% of emissions



Red meat is only 6% of weight, but 34.5% of emissions

Other meat is 5% of weight, but 17.4% of emissions

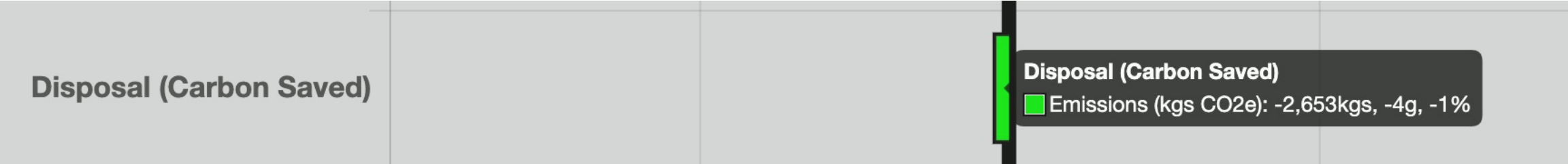
Fruit and Veg are 40% of weight, but only 8.9% of emissions

Case study 1



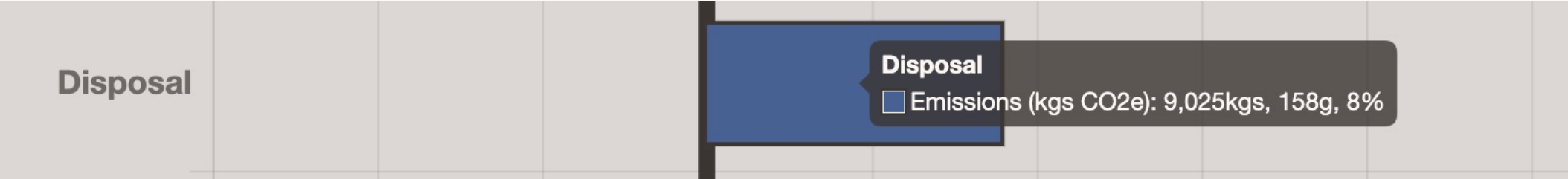
Waste disposal has reduced your total emissions by 3.2%, because you used a digester.

Case study 2



Waste disposal has reduced your total emissions by 0.5, because you used an incinerator.

Case study 5

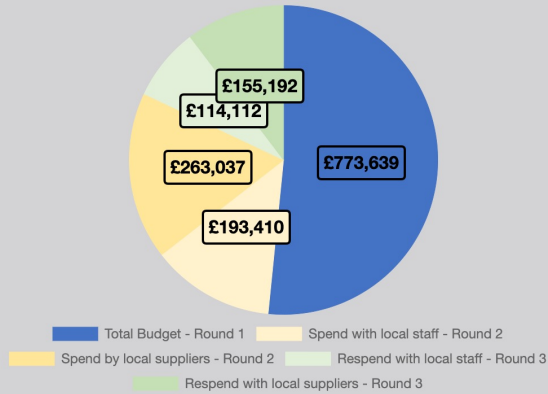


Waste disposal is 8.0% of your total emissions, because you used landfill.

Local Economic Impact - Somerset

LM3 Analysis by Staff, Supplier and Spending Round.

Total value to Local Economy is £1,499,390 and every £ spent generates £1.94

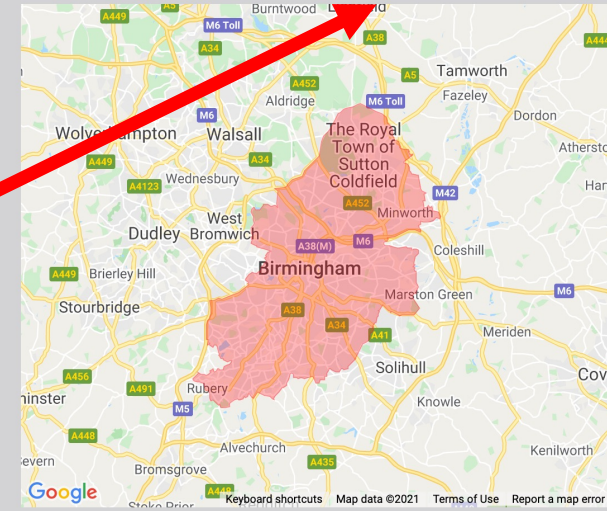
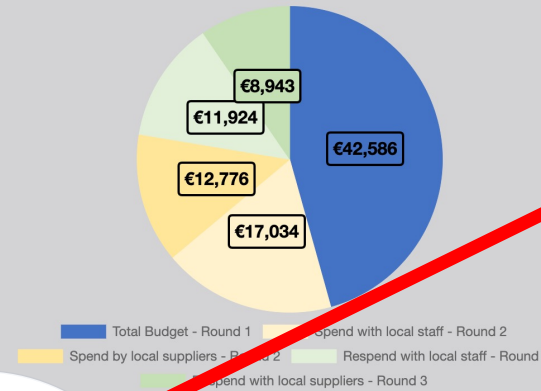


Case study 1

Local Economic Impact - Birmingham

LM3 Analysis by Staff, Supplier and Spending Round.

Total value to Local Economy is €93,263 and every € spent generates €2.19



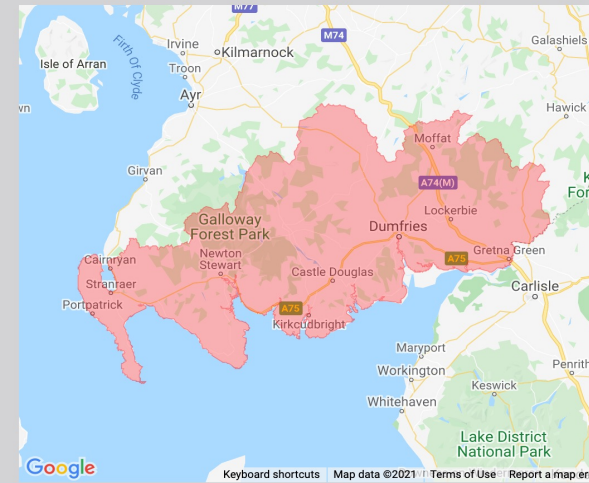
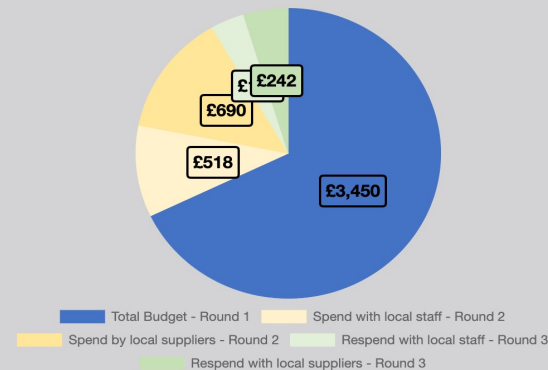
Case study 2

Local socio-economic impacts

Local Economic Impact - Dumfries and Galloway

LM3 Analysis by Staff, Supplier and Spending Round.

Total value to Local Economy is £5,080 and every £ spent generates £1.47



Case study 5

Note: These are not actual locations of case studies to protect anonymity

How Can I Improve?



Current: Landfill	Value Benefit £	CO ₂ Saving kgs CO ₂ e	
Change to digester	N/A	3,458,743.35	<input checked="" type="checkbox"/>
Reduce red meat by 10%	16,590.87	139,313.51	<input checked="" type="checkbox"/>
Reduce plate waste by 10%	473,187.46	2,266,384.53	<input checked="" type="checkbox"/>
Spend 10% more locally	72,575.07	N/A	<input checked="" type="checkbox"/>
Totals	562,353.40	5,864,441.39	

How do I reach net zero?

Carbon Offset	You will need to plant 3,777.31 hectares of woodland annually
Financial Cost	The estimated cost will be £453,276.91

Close

Use the tool completely free for three months from today.

www.meal-analyser.com to register

Or email me at adam@lm3online.com

If we get enough data we will immediately enable sector comparisons section

How Do Your Total Carbon Emissions Compare?

Total emissions per meal (kgs CO ₂ e)		Total emissions per kg of food procured (kgs CO ₂ e)	
Your Emissions	1.76	Your Emissions	4.28
Average for your sector	<i>to be added as data accumulated</i>	Average for your sector	<i>to be added as data accumulated</i>

Key Points

- Your emissions total per meal is 1.76 kgs CO₂e, which is (higher/lower) than the average for your sector
- Your emissions total per kg of food procured is 4.28 kgs CO₂e, which is (higher/lower) than the average sector
- "Emissions per kg of food procured" is a better comparative measure, because it takes account of variations in average meal weights
- Note: higher/lower will be enabled as data is accumulated

