



## Sustainable consumption of Australian red meat in a healthy diet

Three to four healthy, balanced meals a week

# Introduction

This report is part of a series prepared by Meat & Livestock Australia (MLA) that explains how nutrition communications can support the sustainable consumption of Australian red meat in a healthy diet.

The reports connect data and insights from three key topic areas and describe opportunities for nutrition communications:

1

**Healthy diets and environment** – the impact of Australian red meat production and its consumption in a healthy diet on the environment

2

**Healthy diets by life-stage** – consumption patterns and behaviours that influence red meat consumption in a healthy and sustainable diet at different life-stages

3

**Australian red meat and healthy meals** – strategies that will enable consumers to enjoy Australian red meat in a healthy and sustainable diet

Data and insights generated from MLA's research projects in each of these topic areas is described on the [MLA Healthy Meals website](#).

## OUR APPROACH



### Red meat consumption

To describe red meat consumption within the context of typical meal occasions in the Australian diet



### Australian Dietary Guidelines

To recommend consumption of lean red meat as part of a healthy, balanced diet as described in the Australian Dietary Guidelines



### Consumer attitudes

To provide practical guidance that will make it easier for Australians to eat red meat in a healthy and sustainable diet

# Executive summary

This report suggests that providing nutrition communications with meal planning guidance for three to four healthy, balanced meals a week is an easy way to support the sustainable consumption of Australian red meat in a healthy diet.

The findings build on previous MLA reports<sup>1-5</sup> that suggest:

- avoiding food waste by eating amounts of foods in line with Australian Dietary Guidelines is the key to sustainable consumption
- meal planning guidance is an engaging way to provide nutrition communications about consumption of red meat in a healthy diet

The data and insights described in this report suggest helping consumers to make 'every bite count' is a practical way to support sustainable consumption of red meat in a healthy diet.



## RED MEAT CONSUMPTION

- Australians eat red meat with vegetables in evening meals, three to four times a week.
- Portion sizes differ by type of meal with red meat ranging from 70 to 160g.
- Meal-based portion guidance makes it easier to explain how to eat red meat with vegetables and other nutrient-rich foods in recommended amounts.



## AUSTRALIAN DIETARY GUIDELINES

- Red meat is an important source of iron, zinc, omega-3 and vitamin B12 in the Australian diet.
- Amounts recommended in the Australian Dietary Guidelines can be consumed across three to four healthy, balanced meals a week.
- Healthy, balanced meals make 'every bite count' by helping consumers to eat red meat with other nutritious foods in amounts recommended for a healthy weight.



## CONSUMER ATTITUDES

- Most consumers make decisions about red meat consumption within the context of meal planning.
- Purchasing, cooking and storage tips help consumers to enjoy healthy, balanced meals and to avoid food waste.
- Providing portion guidance as part of typical meal planning practices makes it easier for consumers to apply in their everyday meals.



# Red meat consumption

## A 'meat and veg' evening meal



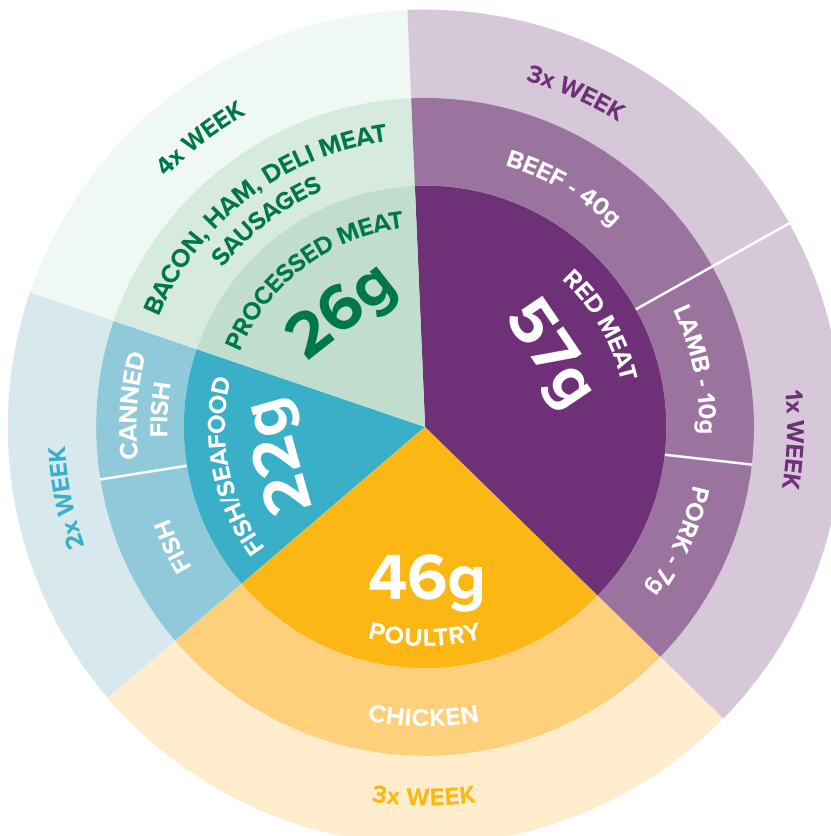
Meal-based portion guidance makes it easier to explain how to eat red meat with vegetables and other nutrient-rich foods in recommended amounts.

### Three to four times a week

Australians eat red meat with vegetables in evening meals, three to four times a week.

- Average per capita consumption of red meat is consistent with Australian Dietary Guidelines<sup>6,7</sup>.
- Red meat is consumed three to four times per week, poultry, three times a week, and fish/seafood, twice a week<sup>7,8</sup>.
- Australians eat more unprocessed (103g per day poultry and red meat) than processed meat products (26g per day)<sup>7</sup>.
- Beef and lamb in Australia are mostly consumed lean or semi-trimmed.

Consumption of meat, fish and poultry in the Australian diet<sup>7</sup>



#### Australian Dietary Guidelines<sup>6</sup>

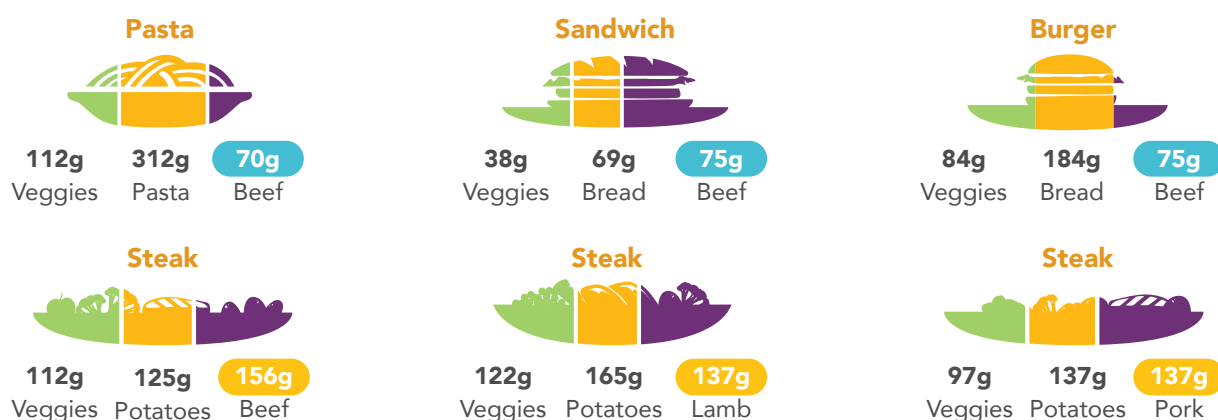
- Recommends 65g per day lean and cooked red meat
- Red meat includes unprocessed beef, lamb, pork, kangaroo and game meat
- Processed meat products are not included in the red meat recommendation

## Meal-based portion sizes

Portion sizes are largely determined by the type of meal in which the food is consumed.

- Australians eat red meat in a variety of meals with portion sizes ranging from 70g to 160g per serving, cooked weight<sup>9</sup>. For example, steaks are generally 160g per serving while pasta is around 70g per serving.
- Like red meat, the portion size of other foods consumed with the meal such as wholegrains, legumes and vegetables vary according to the type of meal consumed<sup>9</sup>.
- The findings suggest a meal-based approach is a practical way to provide portion guidance.

### Typical portion sizes of popular meals in the Australian diet<sup>9</sup>

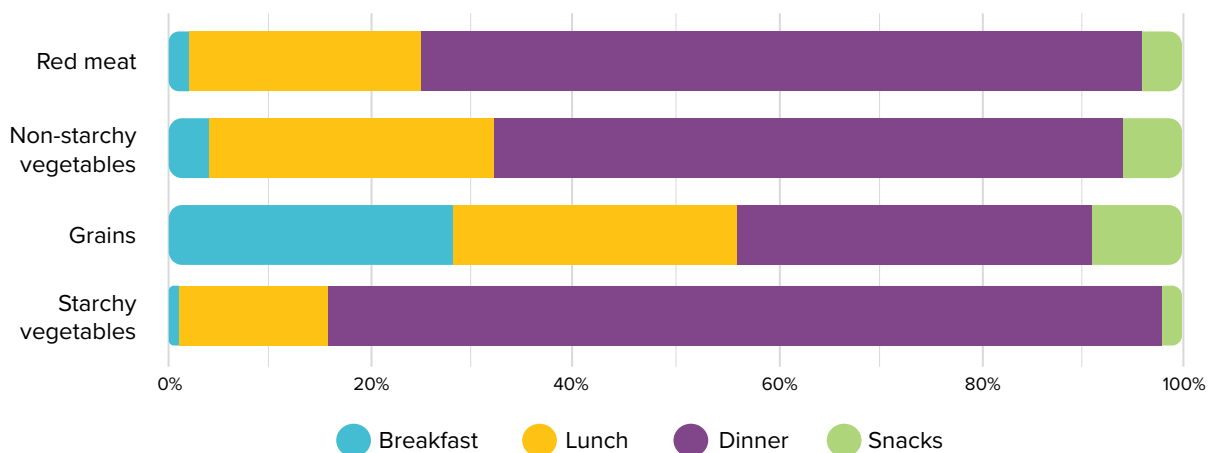


## A 'meat and veg' dietary pattern

Australians eat red meat with vegetables.

- Meals typically served with three or more vegetables include 'meat and veg' style meals, stir fries, roasts, salads and casseroles<sup>3,5</sup>.
- Several studies have reported a positive association between red meat and vegetable consumption<sup>9,10,11</sup>.
- With intake of vegetables below recommended amounts in Australia<sup>12</sup>, the evening meal provides an opportunity to help consumers eat more vegetables<sup>2,4</sup>.

### Red meat consumption by meal occasion<sup>9</sup>





# Australian Dietary Guidelines

*Three to four healthy, balanced meals a week*



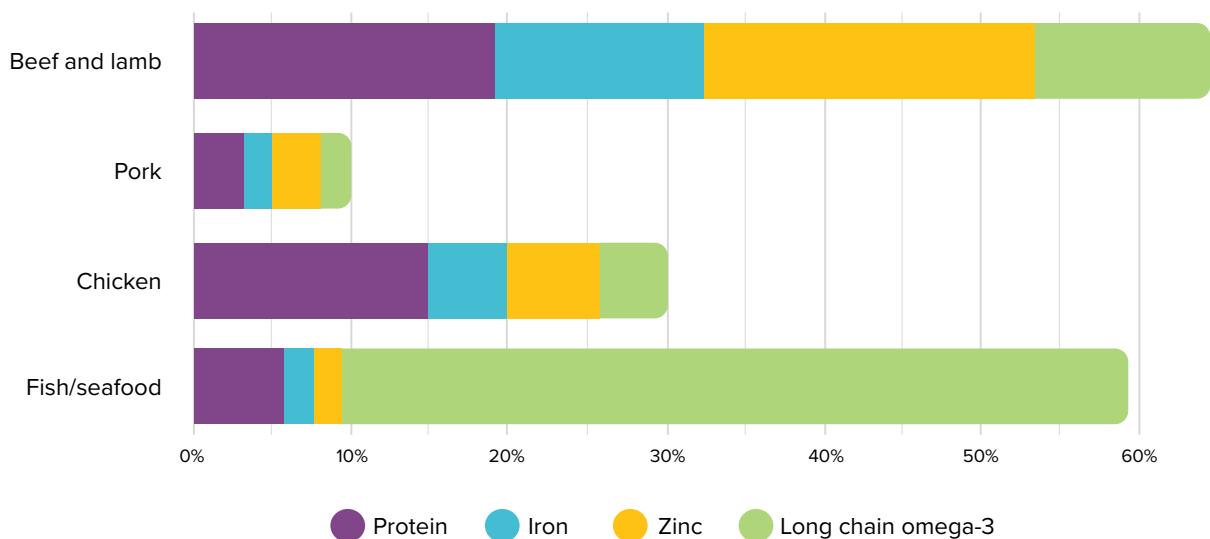
Healthy, balanced meals help consumers to eat red meat with other nutritious foods in amounts recommended for a healthy weight, making ‘every bite count’.

## Red meat’s essential nutrients

Red meat consumption is recommended as part of the ‘Lean meats and poultry, fish, eggs, tofu, nuts and seeds, and legumes/beans’ food group<sup>6</sup>. Eating a variety of foods that provide dietary protein is recommended because each food provides distinctive nutrients<sup>6</sup>.

- Red meat is an important source of iron, zinc, omega-3 and vitamin B12 in the Australian diet<sup>6</sup>.
- Popular choices, such as beef and lamb, contribute to 12% and 19% of total dietary intake of iron and zinc, respectively and around 12% of total long chain omega-3 intakes<sup>7</sup>.
- Evidence shows that red meat plays an important role in preventing iron deficiencies, which remain a challenge in young women, infants and toddlers, particularly when energy intake is restricted<sup>13-19</sup>.
- Infant Feeding Guidelines recommend introducing iron-rich foods, such as lean red meat, from six months of age to prevent iron deficiency<sup>20</sup>.
- As a nutrient-rich protein food, dietary interventions suggest consumption of red meat three to four times a week makes it easier for older people to get enough protein and essential nutrients, important for maintaining muscle health and an independent lifestyle after 65 years<sup>21-23</sup>.

**Red meat’s contribution to nutrient intake in the Australian diet (%)<sup>7</sup>**



## Red meat three to four times a week

Amounts of red meat recommended in the Australian Dietary Guidelines (65g per day, cooked weight) can be consumed across three to four healthy, balanced meals a week.

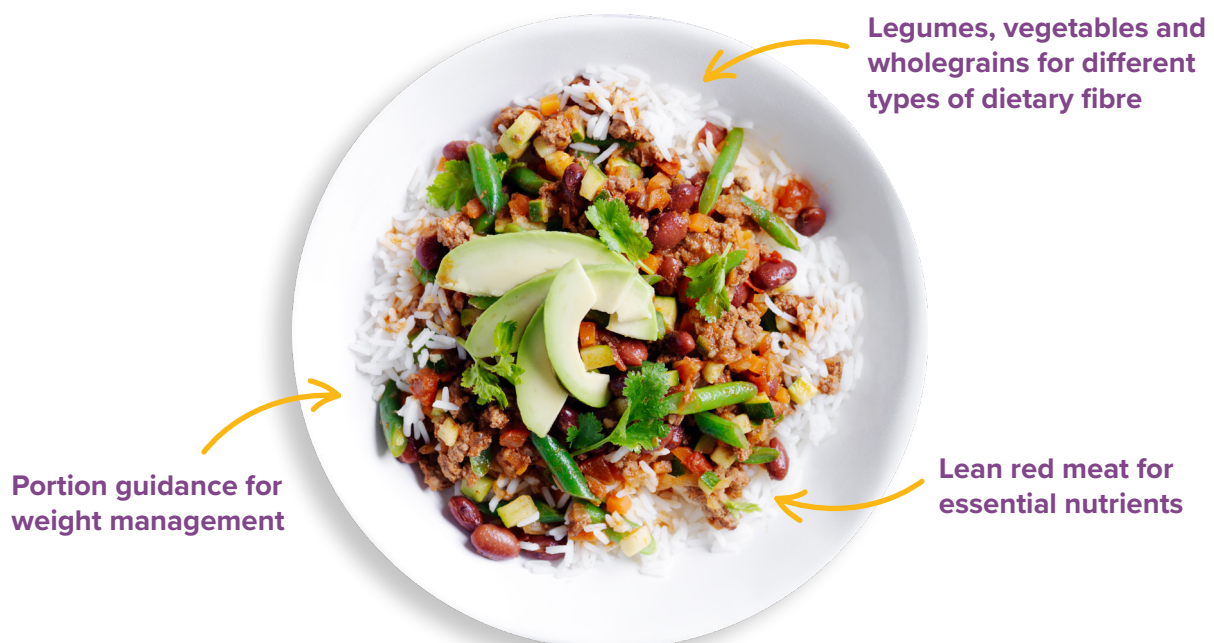
- Dietary modelling informed the daily amount of 65g lean and cooked red meat recommended in the Australian Dietary Guidelines<sup>24</sup>.
- The modelling considered the Australian food supply, typical consumption patterns, nutrient requirements and dietary goals for reducing chronic disease risk and promoting health and wellbeing.
- For variety and to reduce chronic disease risk from overconsumption, the modelling limited amounts recommended for a nutritionally adequate diet, equivalent to 455g per week, lean and cooked red meat<sup>24</sup>.
- To accommodate meals typically consumed with larger portion sizes, the Australian Guide to Healthy Eating suggests consuming the daily amount recommended every other day<sup>25</sup>. For example, 130g of lean red meat every second day. This approach is consistent with Australian red meat consumption three to four times a week<sup>7,8</sup>.

## Healthy, balanced meals three to four times a week

Healthy, balanced meals make 'every bite count' by helping consumers to eat red meat with other nutritious foods in amounts recommended for a healthy weight.

- For health and wellbeing, nutrition communications should help consumers to eat red meat as part of a healthy, balanced diet<sup>26-30</sup>.
- Maintaining a healthy weight is important for reducing chronic disease risk<sup>31,32</sup> and a meal-based approach is a practical way to help consumers eat lean red meat with other foods in amounts recommended for a healthy weight.
- It is also a way to ensure that red meat is consumed with other nutritious foods. For example, eating red meat with different vegetables, wholegrains and legumes helps to increase consumption of the different types of dietary fibre, important for gut health<sup>33,34</sup>.

### Red meat consumption three to four times a week in healthy, balanced meals





# Consumer attitudes

## *Meal planning is practical*



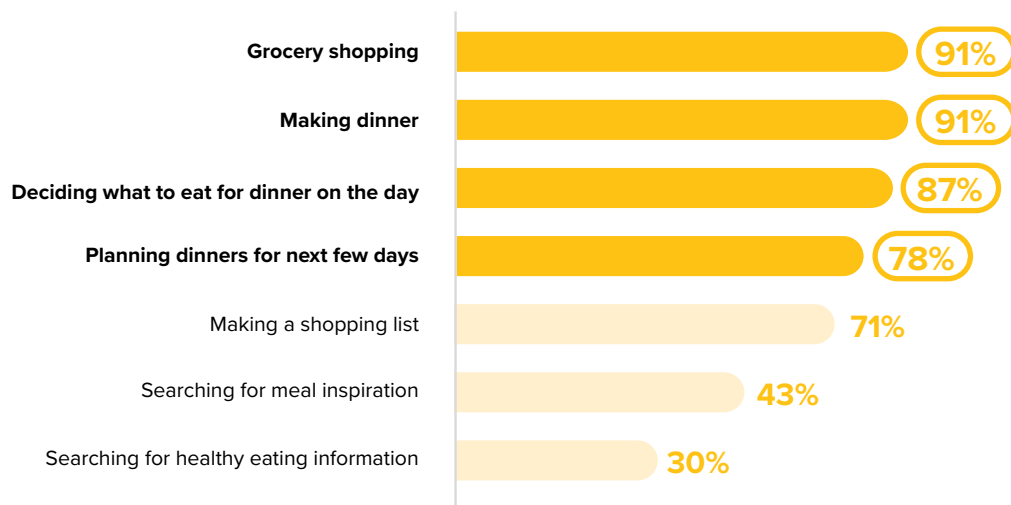
Meal planning is a practical way to help consumers find easy ways to integrate healthy and sustainable eating habits into their everyday meals.

### The decision-context

Most consumers make decisions about red meat consumption within the context of meal planning.

- Meal planning includes the deciding, buying, preparing and serving of evening meals.
- These are frequent activities for most Australians and the context in which they typically make decisions about the type and amounts of foods consumed<sup>2</sup>.

#### Frequency of food and nutrition-related activities (at least once a week)



Source: Kantar 2019, Quantitative online interview (n=2001)  
Q: How frequently do you undertake the following activities?

### Builds practical skills

Meal planning guidance enables adoption of healthy and sustainable eating habits.

- Consumers are looking for easy ways to fit healthy, balanced meals that are affordable and enjoyable into their busy lifestyles<sup>2</sup>.
- Meal planning guidance builds practical skills that make it easier to enjoy healthy, balanced meals and reduce household food waste<sup>2-4</sup>.
- Knowing how to freeze and thaw food safely, as well as how to use leftovers, helps to reduce food waste and provides convenient ways to have readily available healthy meals.



## Applicable in everyday meals

Providing portion guidance as part of typical meal planning practices makes it easier for consumers to apply in their everyday meals.

- Portion guidance is the key to healthy and sustainable eating - choosing the right foods in the right amount is the key to a healthy diet<sup>6</sup>. The amount of food consumed is also the main determinant of the environmental footprint of the diet<sup>1</sup>.
- Consumers often make decisions about portion size as part of everyday meal planning activities<sup>2</sup>.
- Using popular meals and practical tips to provide portion guidance makes it easier for consumers to apply in their everyday meals<sup>2</sup>.

## Shopping

### How much meat do I need?

Shoppers typically purchase a variety of protein foods and quantities according to the number of planned servings of the meal.

- The number of servings is often unrelated to the number of people in the household and often eaten over several meal occasions.
- Consumers want to know how often they can plan meals with red meat across the week and how much to buy.
- Providing guidance on frequency and purchase weights by number of servings is an easy way for consumers to understand how to eat recommended amounts of red meat. For example, 500g, a typical purchase weight for mince, serves four because amounts are purchased according to the number of servings planned.

## Preparing

### How can I get more vegetables into my meals?

Consumers are keen to find ways to serve their everyday meals with more vegetables.

- Providing inspiration on ways to enjoy red meat with a variety of three or more different types of vegetables is an engaging and practical way to increase vegetable consumption. For example, guidance on the type of vegetables that perform best in different types of meals, swaps and amounts for number of servings planned.

## Serving

### How much carbohydrate food should I be serving?

Consumers would like to receive guidance on amounts of carbohydrate foods to serve individuals with different energy needs.

- Red meat is usually served with starchy vegetables (e.g., potatoes), pasta, rice, or bread<sup>2,9</sup>.
- Providing guidance on portion sizes according to energy needs provides reassurance on amounts to eat to maintain a healthy weight.
- For example, guidance on amounts of pasta and rice to cook for small, medium and large servings helps consumers to eat recommended amounts and also helps to reduce household food waste.

# Conclusion

This report is part of a series that explains how nutrition communications can support the sustainable consumption of Australian red meat in a healthy diet.

- The *Last night's dinner*, *Main meal repertoires*, *What's cooking* and the *MLA Healthy Meals* reports describe popular meals, practices and sources of nutrition information that suggest meal planning guidance is an engaging way for nutrition communications to support consumption of red meat in a healthy diet.
- The *Environmental impact of red meat in a healthy diet* report suggests nutrition communications that help consumers to eat foods in amounts recommended in the Australian Dietary Guidelines will help to avoid food waste, the key to sustainable consumption.

The findings from this report suggest helping consumers to make 'every bite count' is a practical way to support sustainable consumption of red meat in a healthy diet.

Meal planning guidance for three to four healthy, balanced meals a week helps consumers to make 'every bite count' by providing:



**Guidance on eating Australian red meat** in line with amounts recommended in the Australian Dietary Guidelines



**Portion guidance for eating lean red meat** with other nutritious foods in amounts recommended for a healthy weight



**Purchasing, cooking and storage tips** that make it enjoyable to eat healthy, balanced meals three to four times a week and easy to avoid food waste



The following reports will consider the type of nutrition communication strategies that support the sustainable consumption of Australian red meat in a healthy diet.

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