

Consumer Perceptions & Understanding of Packaging

Survey data set



RMIT Contributors

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Methodology

The Survey Design referenced national and international research to allow comparisons to be made against the Australian findings of the Journey Mapping research. The FFWCRC 3.3.1 National Benchmark Survey (NBS) acted as the national reference and was adapted with the international UK study, conducted by INCPEN & WRAP (2019). Both studies reviewed consumer perceptions of food waste and food packaging. The NBS focused on Australian perceptions whilst the UK study compared social perceptions aggregated from England, Wales, Scotland, Northern Ireland, London and Kent and compared 2012 and 2019 results. Overall, to conduct a national comparison study within Australia, and a cross-cultural comparison study between UK and Australian representation perceptions, the EPPS survey adapted survey questions from the FFWCRC Project 1.2.2 Journey Mapping study, the FFWCRC Project 3.3.1 survey and the UK INCPEN & WRAP (2019) survey with all the time differences between studies maintained at approximately less than one year.

The EPPS questions were structured using one of the three designs: (1) Select the most relevant Multiple Choice response, (2) Select-All-That-Apply (SATA) response, or (3) an Ordinal Scaled matrix responses, with appropriate survey questions including an 'other' text option enabled for expanded responses. The series of survey questions that adopt the Ordinal Scaled matrix responses are compared on either a 5-point Likert Scale ranging from 'Strongly disagree/dislike' to 'Strongly agree/like' with the point-3 representing the central 'neutral' or 'unknown' response; or an intensity 10-point scaling system ranging from 1 very little to 10 a lot. Classification of household types and income levels were referenced from the 14th Annual Statistical Report of the HILDA Survey: The Household, Income and Labour Dynamics in Australia Survey (Wilkins et al., 2019 pg. 8).

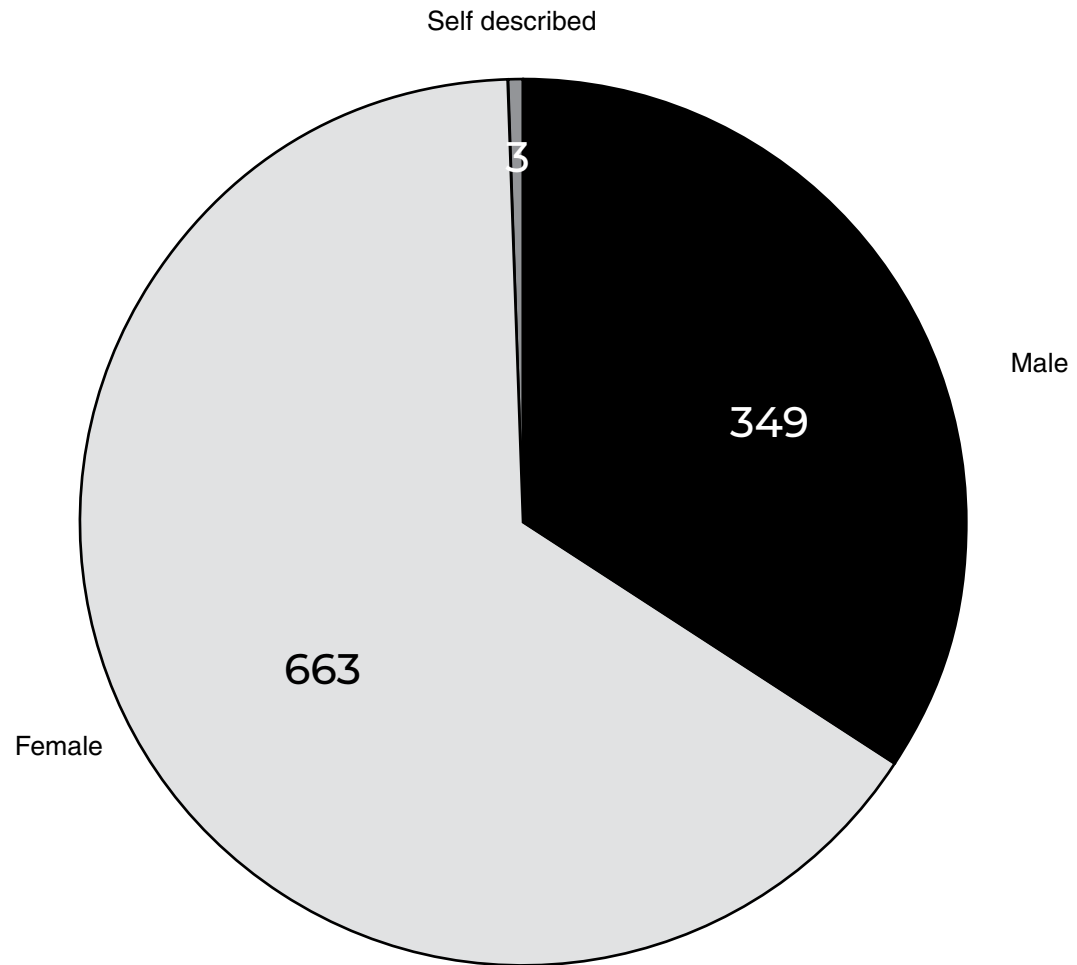
Participants

A sample size of 1,015 participants was surveyed. Recruitment of participants was achieved through the online market research agency, Qualtrics XM who project managed and recruited participants from their existing Australian panellists. The participant selection criteria sort representatives that were:

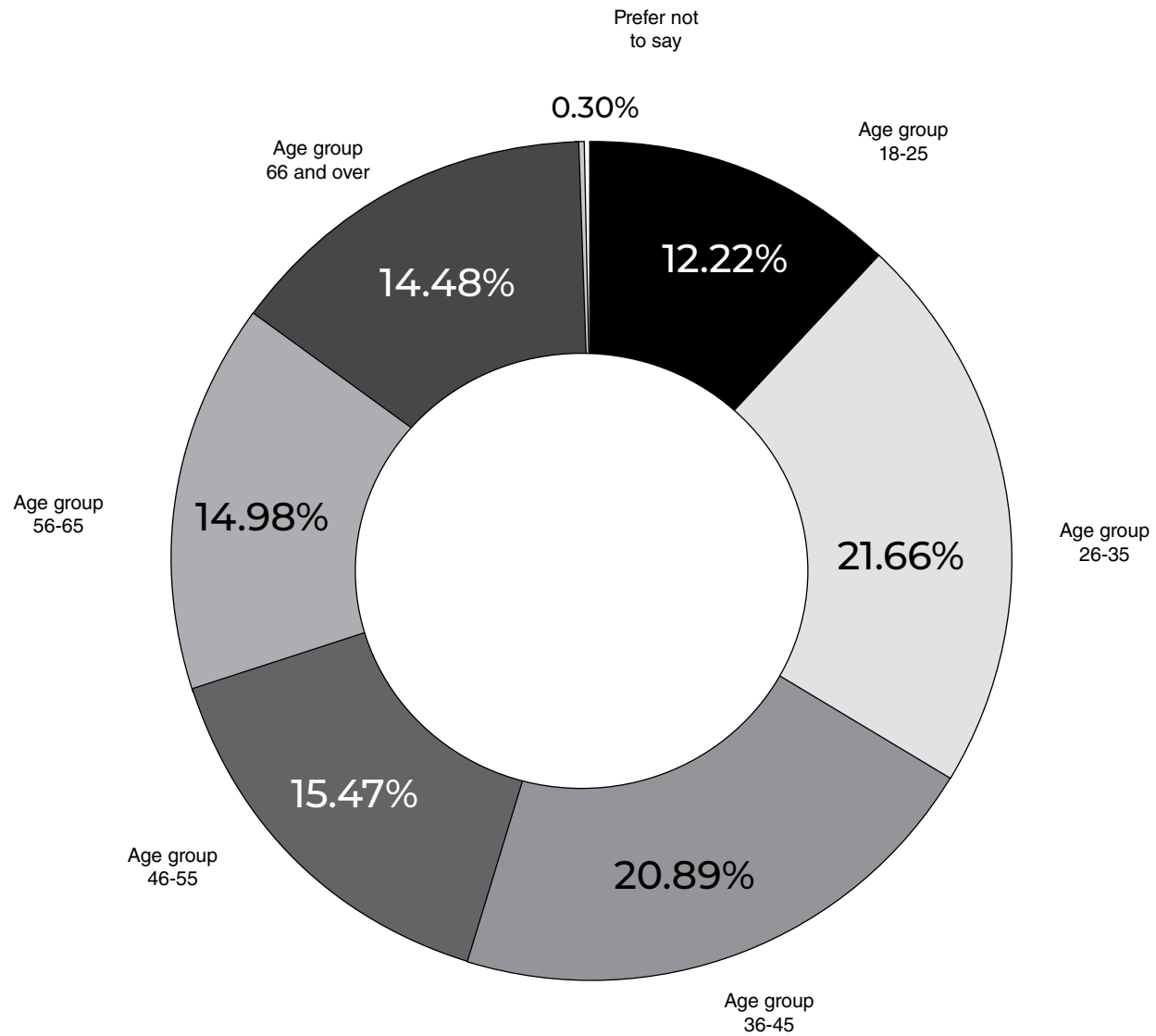
- Australian permanent residents;
- A mix of males and females;
- Proficiency in English;
- Aged 18 and over (targeting a normal distribution of ages);
- A cross-section of the nation's population within each State and Territory based on reported ratios from the Australian Demographic Statistics (ABS, 2019);
- Primary food purchasers and/or food preparers in a household;
- Familiar with their allocated food waste group (filtered through pre-defined survey quotas set to capture approximately 200 users (20% of sample) per food group). The survey filtered participants into one of the five food categories for specific enquires relating to: (1) Meat and Seafood, (2) Bakery, (3) Packaged and Processed Foods, (4) Dairy and eggs, and (5) Fresh Fruit and Vegetables.

Participants were omitted if they returned incomplete or automatically completed surveys, identified as under 18, did not provide consent, and/or they did not meet the selection criteria stipulated above.

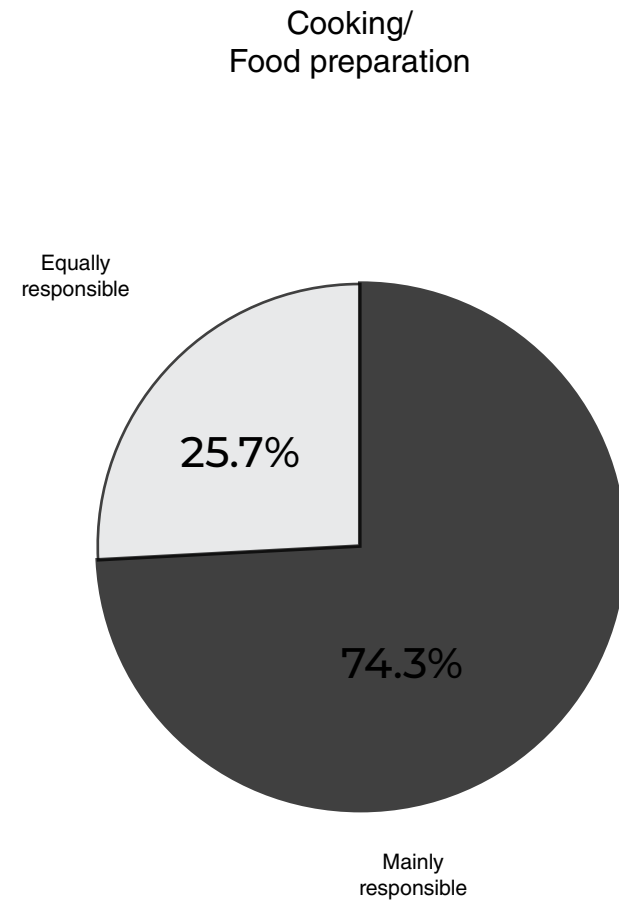
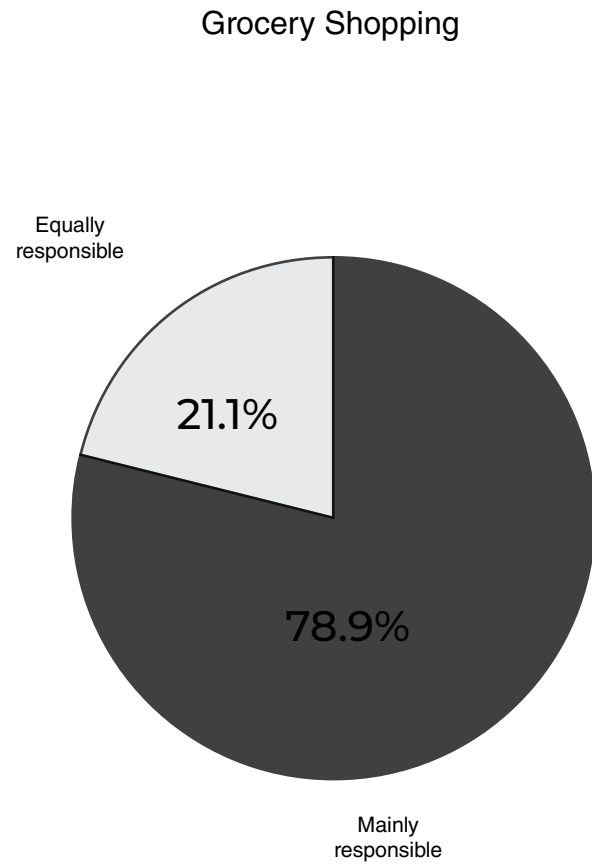
Q1: What gender do you identify as?



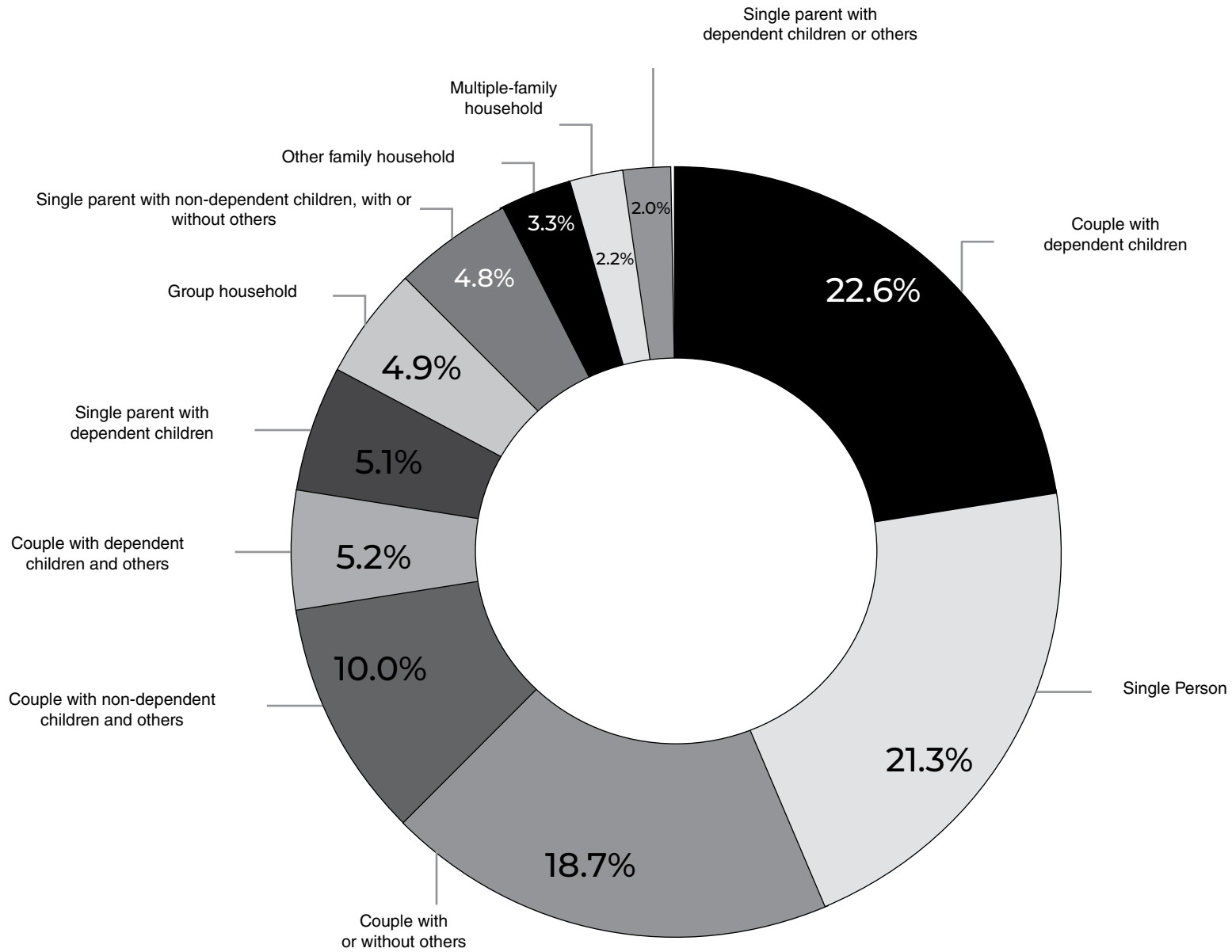
Q2: Which one of the following age groups do you fall into?



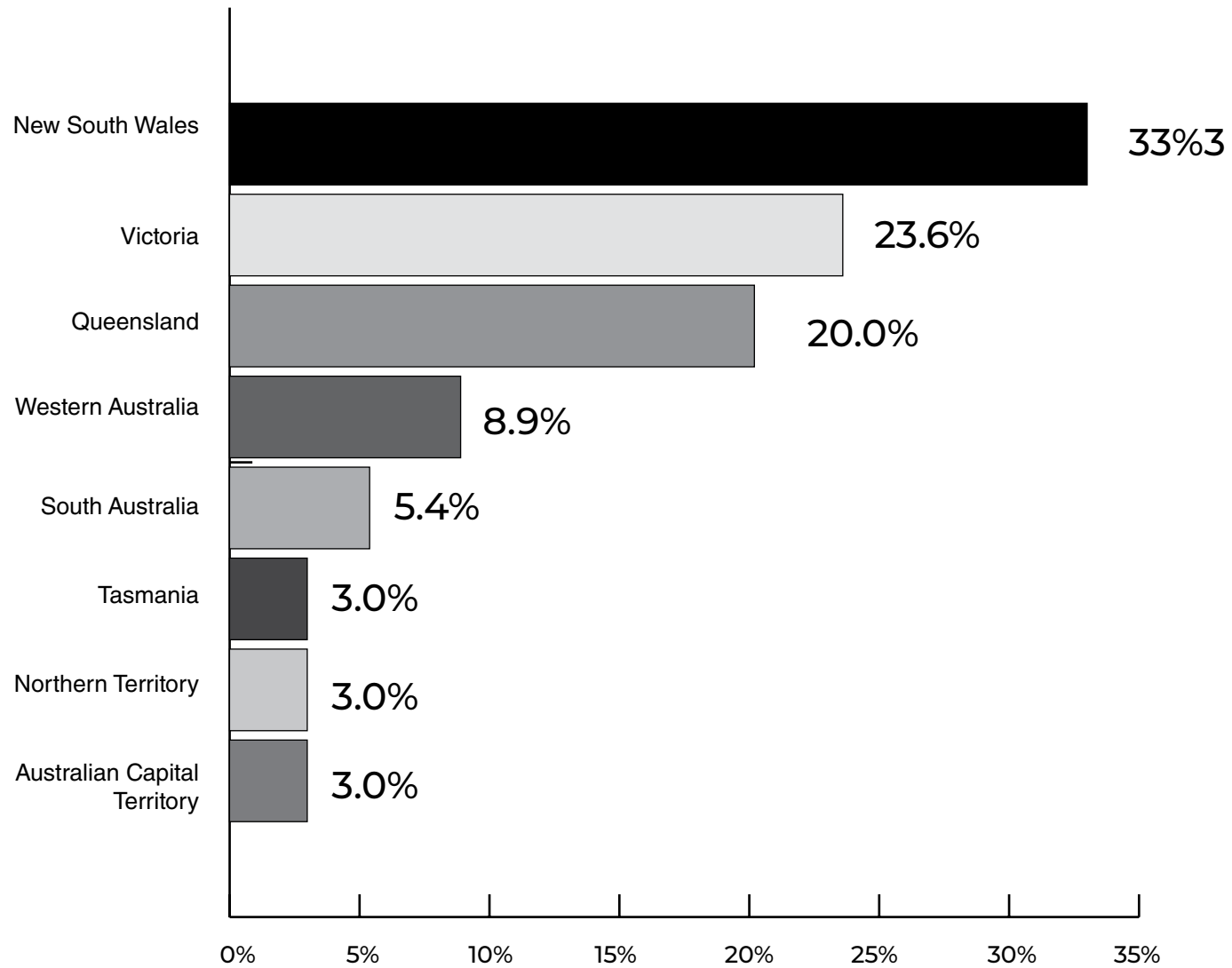
Q3: To what extent are you responsible for the following in your household?



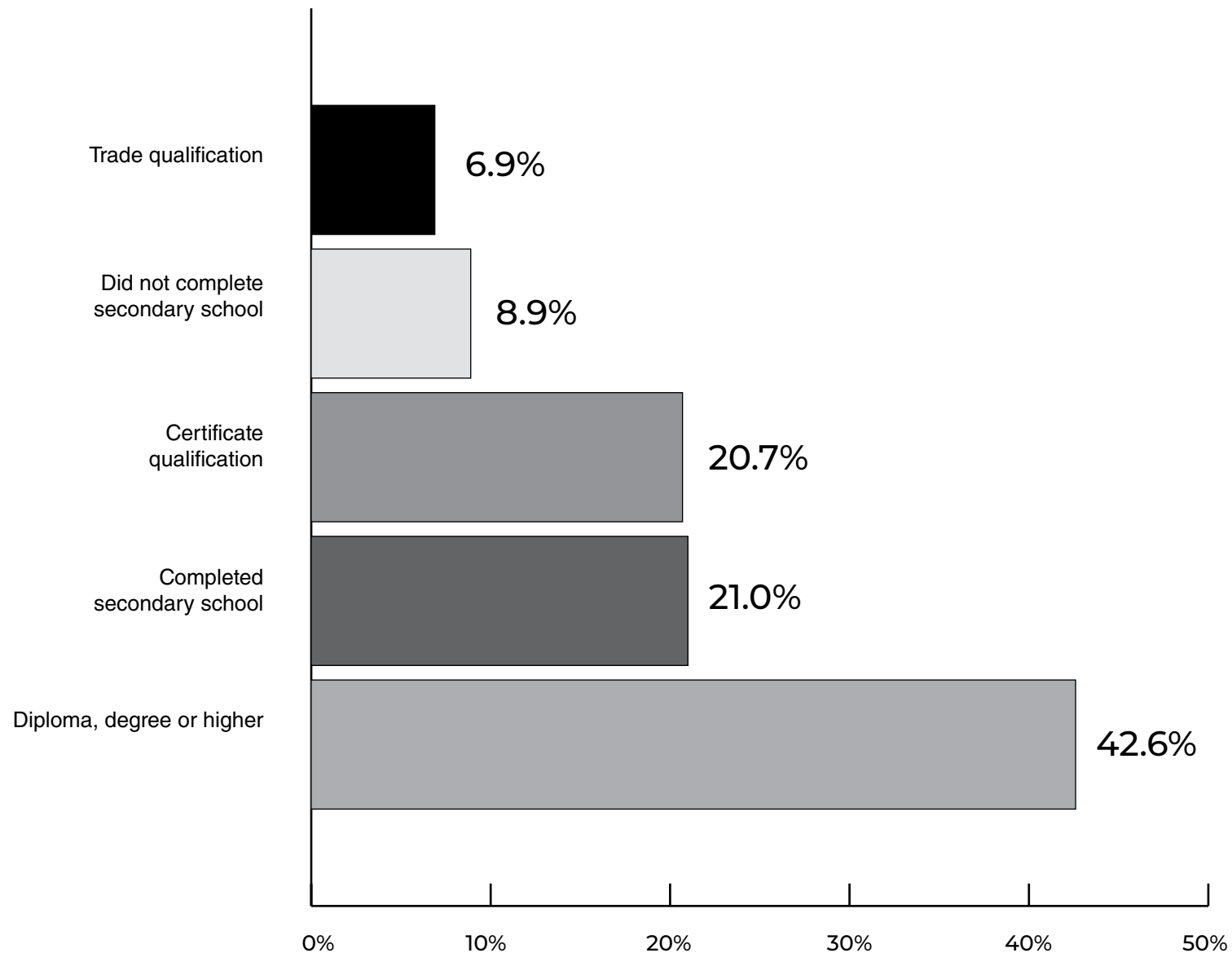
Q4: Which of the following describes your household living arrangements?



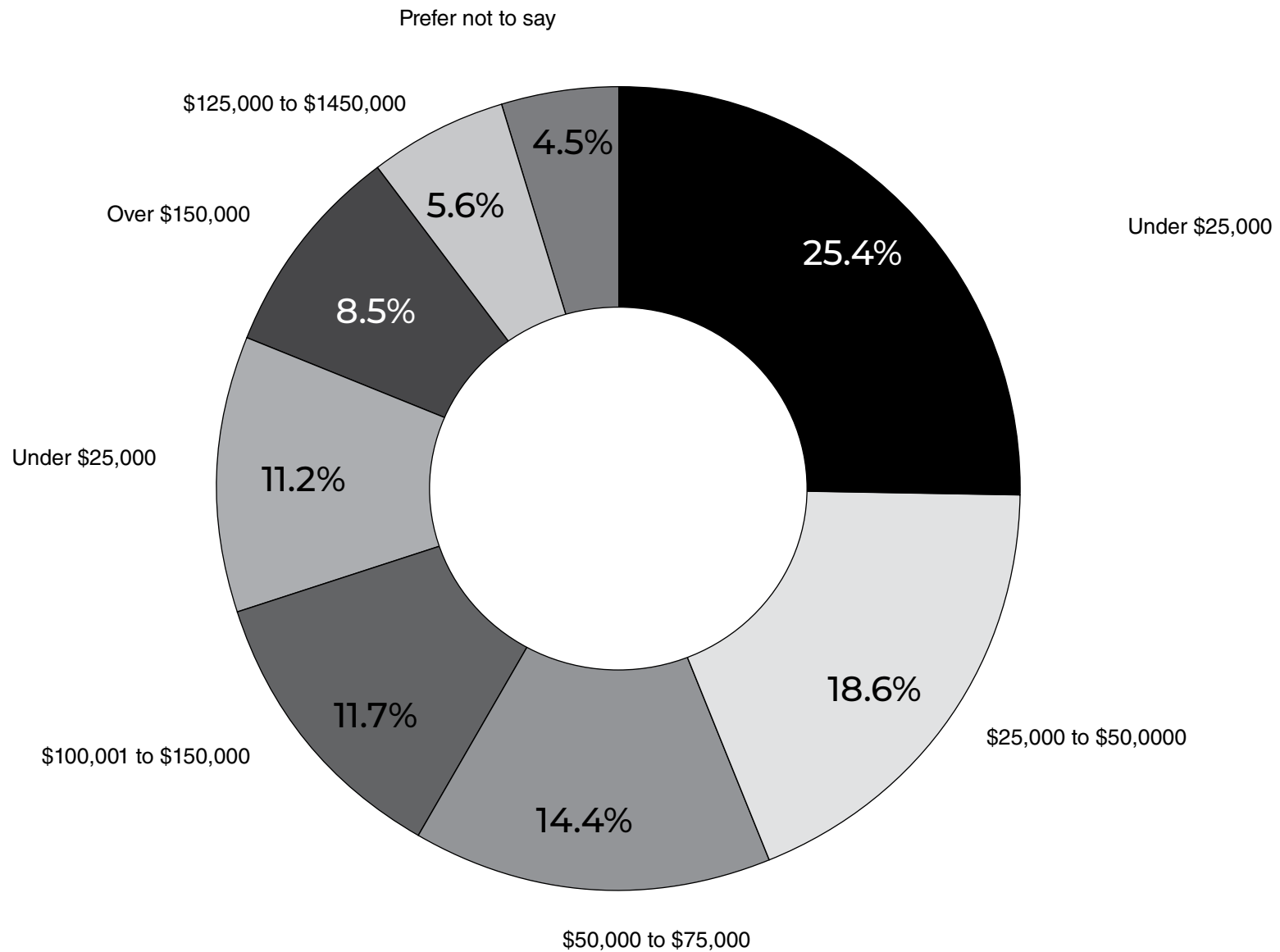
Q5a: Please select your home state



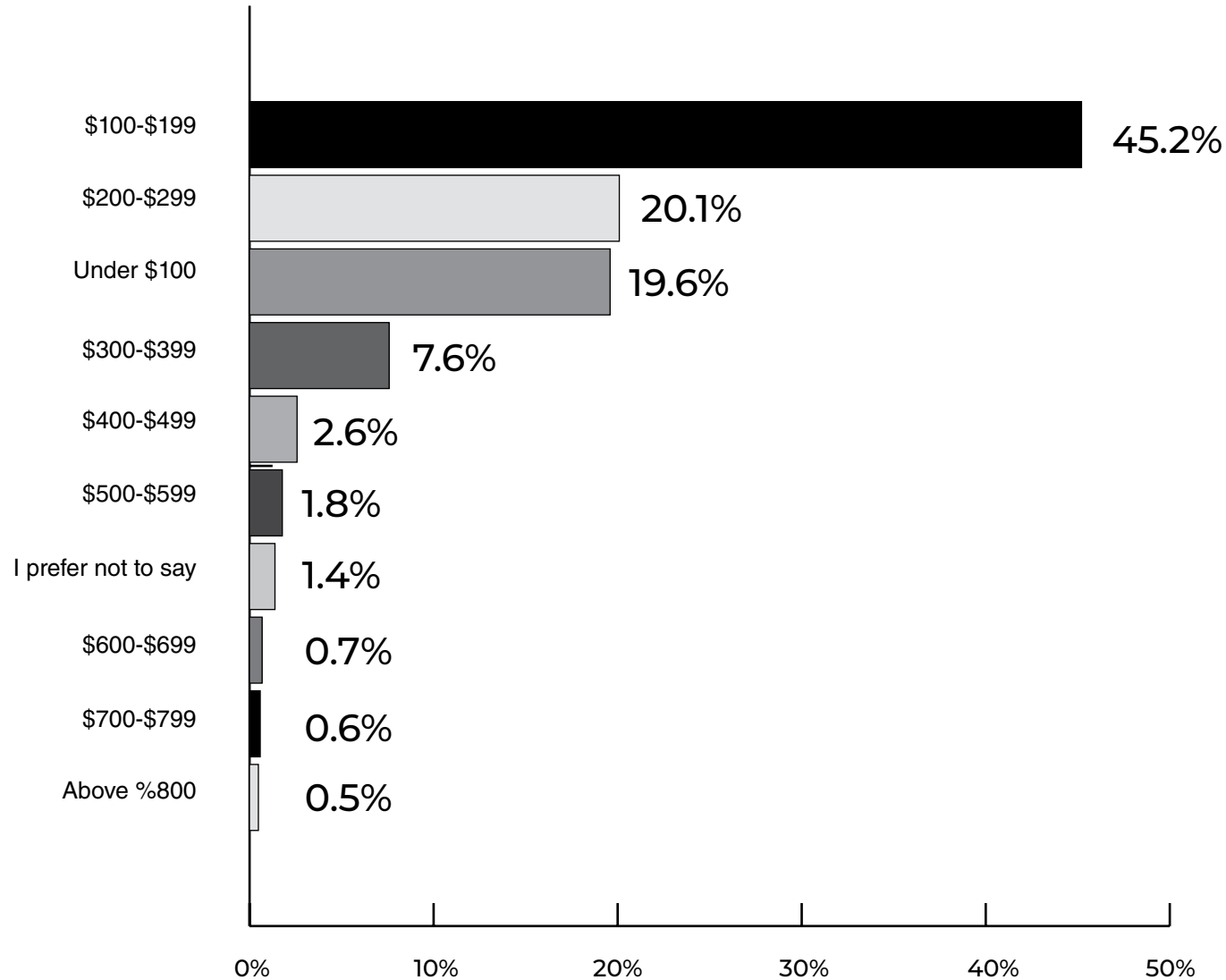
Q6: What is the highest level of education you have obtained?



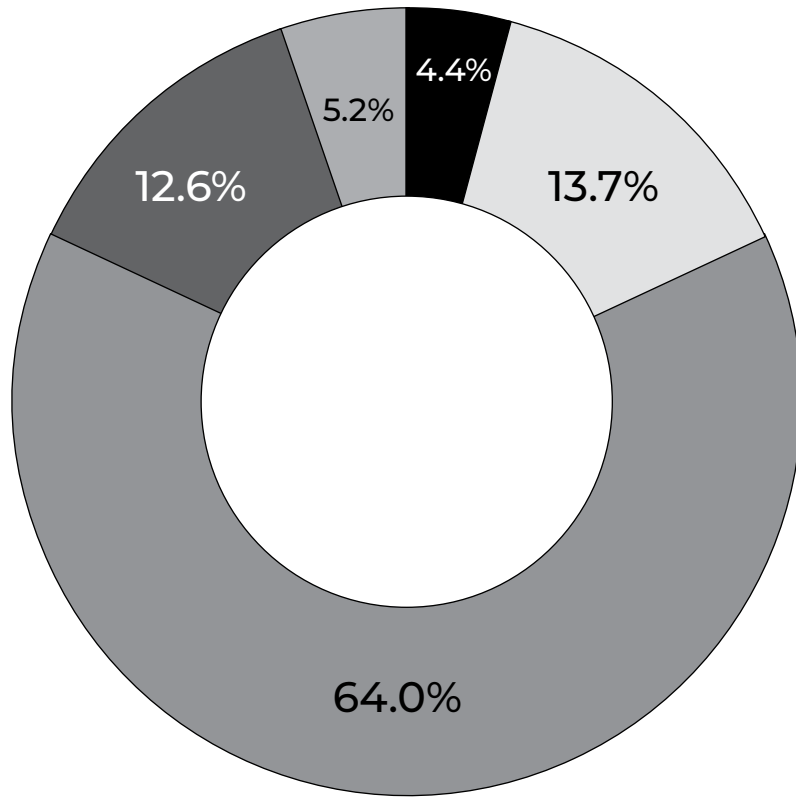
Q7: Which of the following describes your yearly household income?



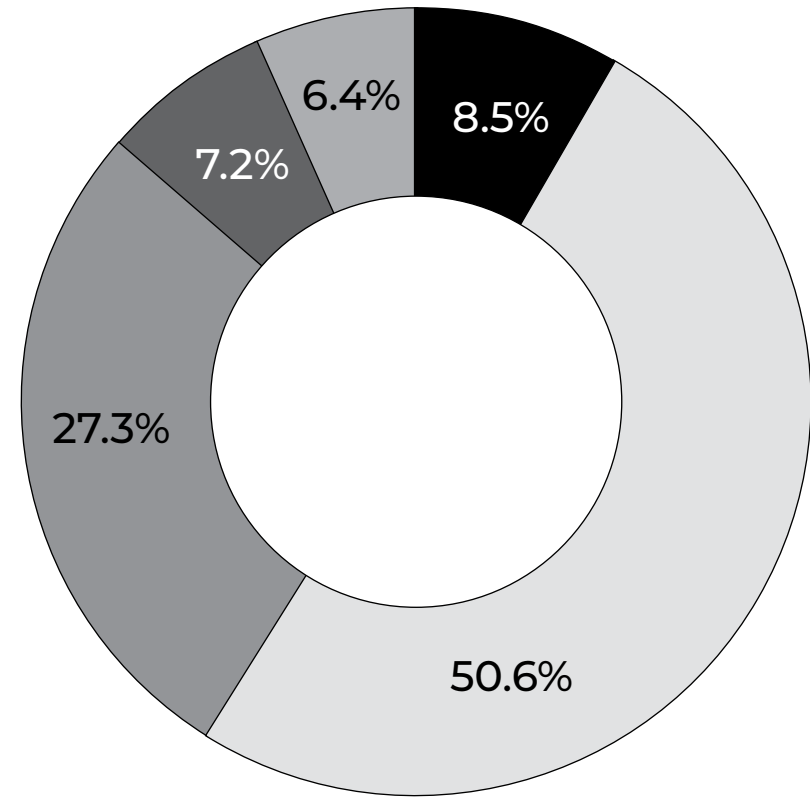
Q8: In a typical week, what do you (including household) spend on grocery shopping (excluding alcohol)?



Q9: How often does your household do the following?



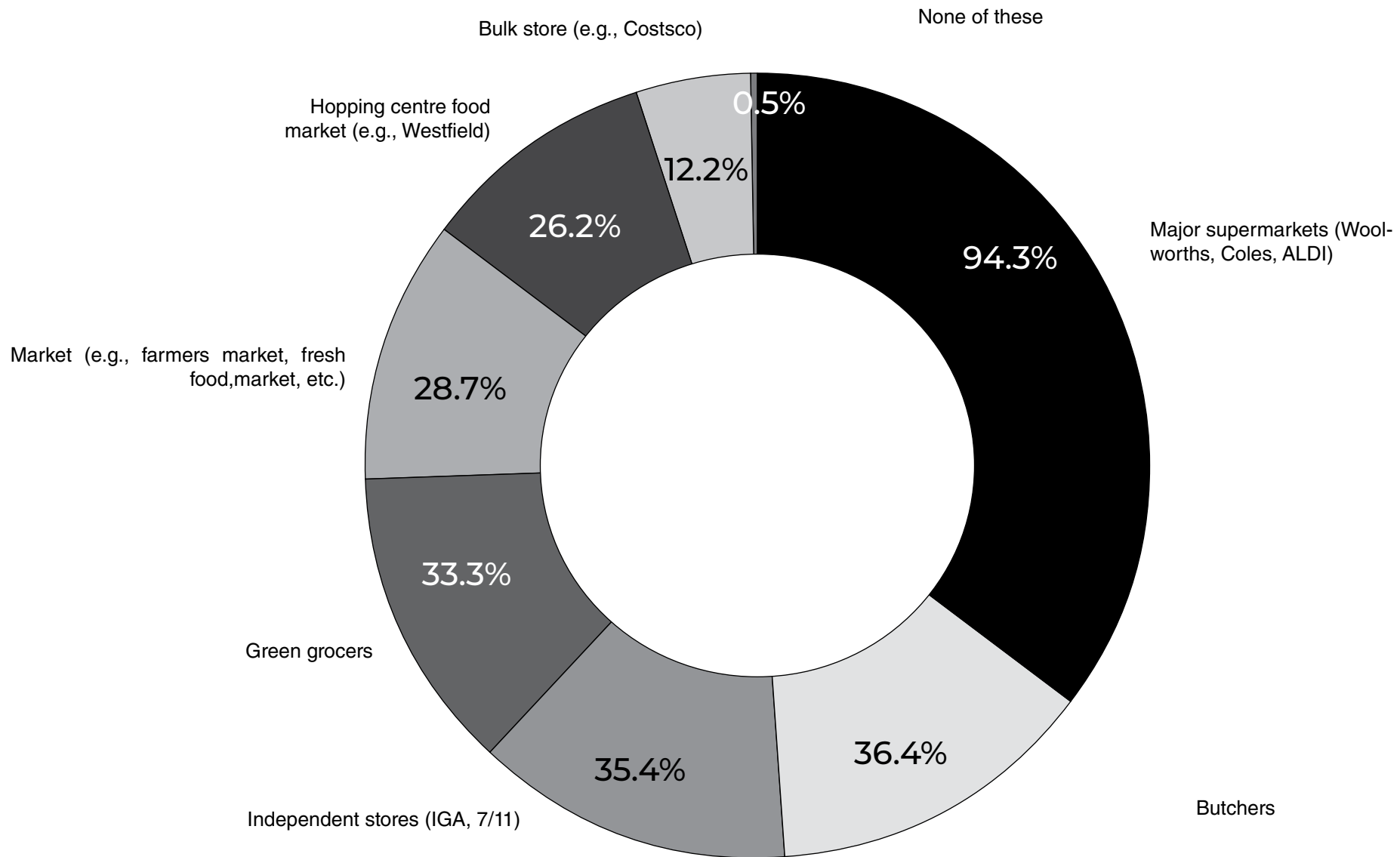
Main Shopping



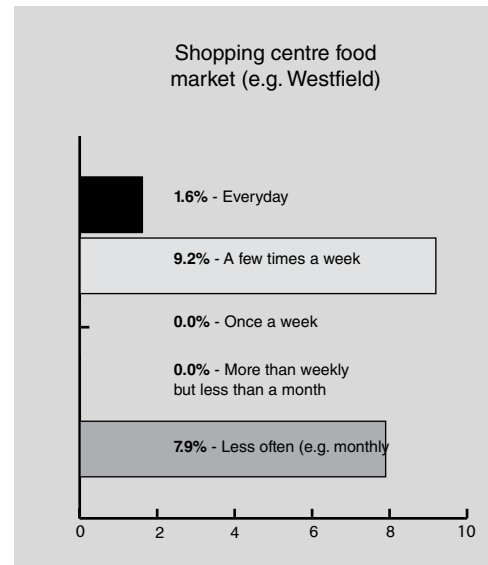
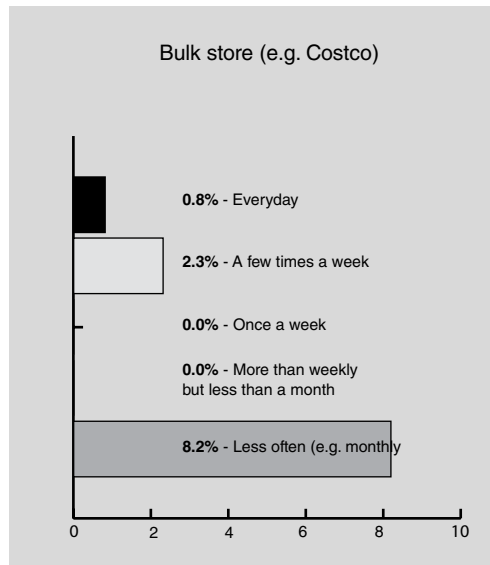
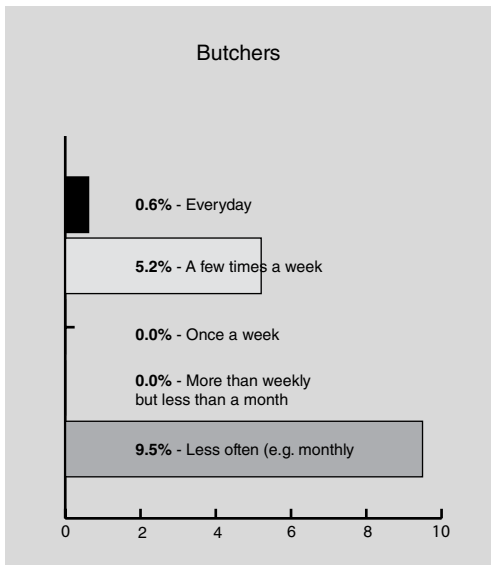
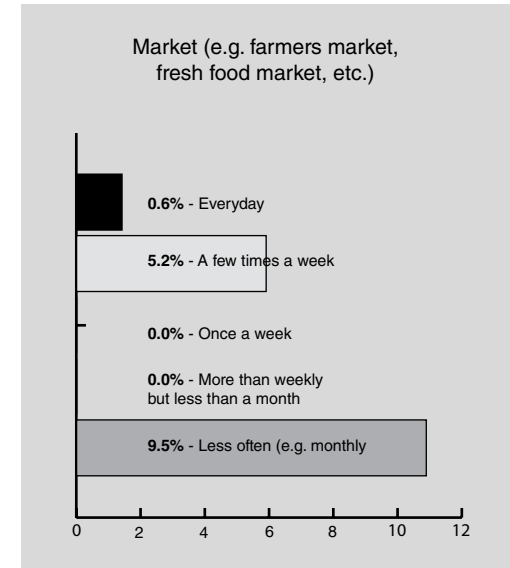
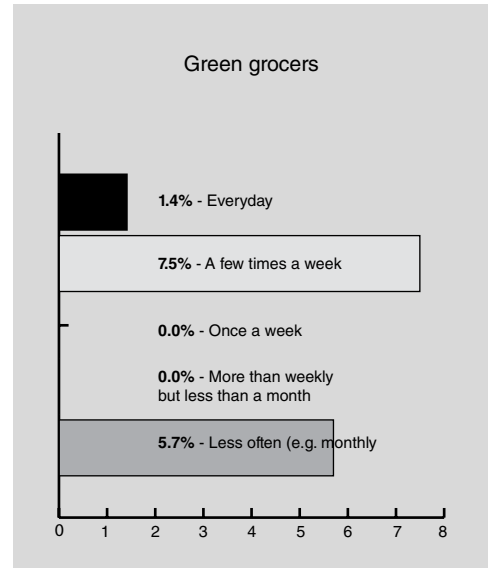
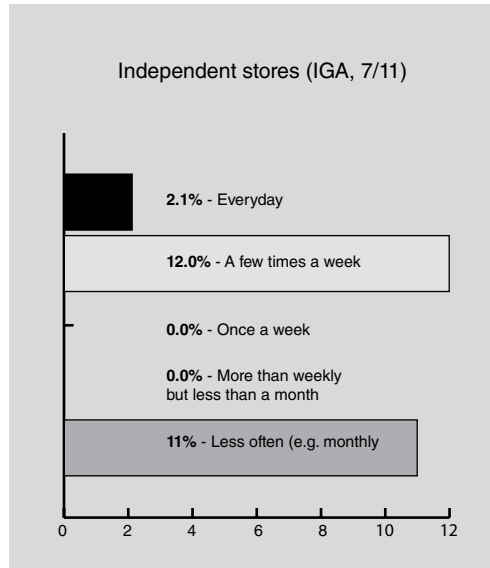
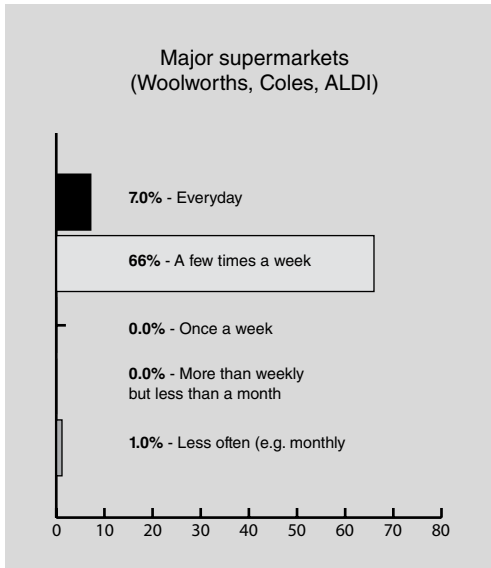
Top up Shopping

Everytime Most times About half the time Sometimes Never

Q10: In the last 3 months, which of the following types of retailers have you used to shop for food? (e.g. in-store / online)

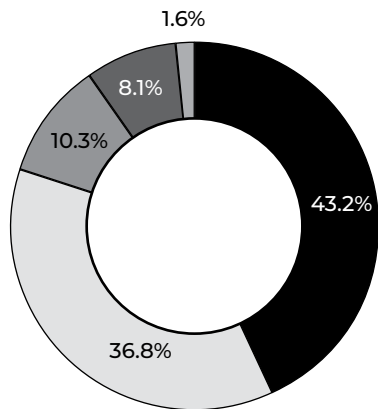


Q10b: How often do you typically attend/shop with each retailer?

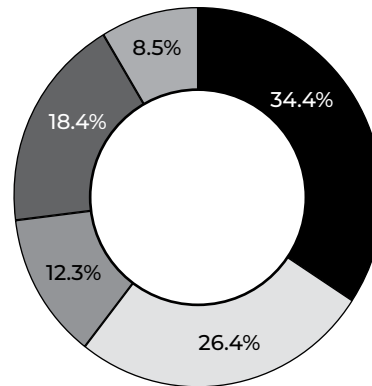


Q11: Before you do the main grocery shopping, how often do you do the following?

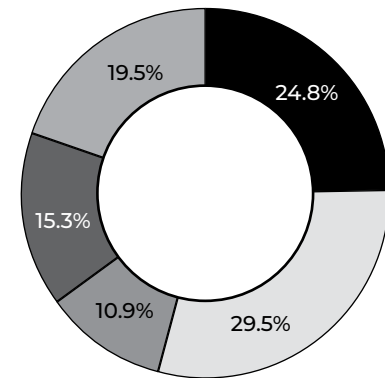
Check what food is already in the house



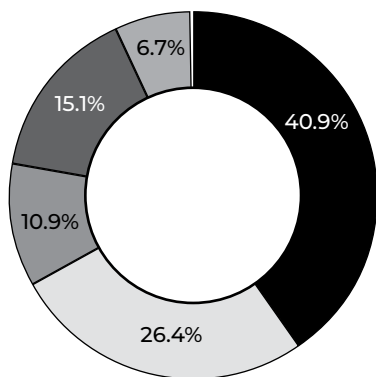
Check for promotions and specials (e.g., catalogues or online)



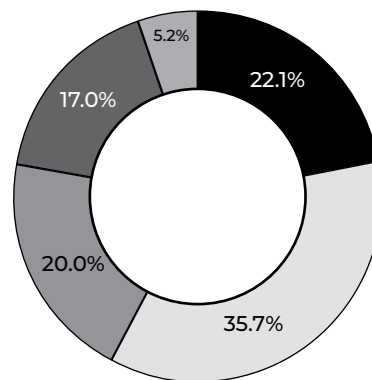
Ask other household members what food or meals they want



Write a shopping list



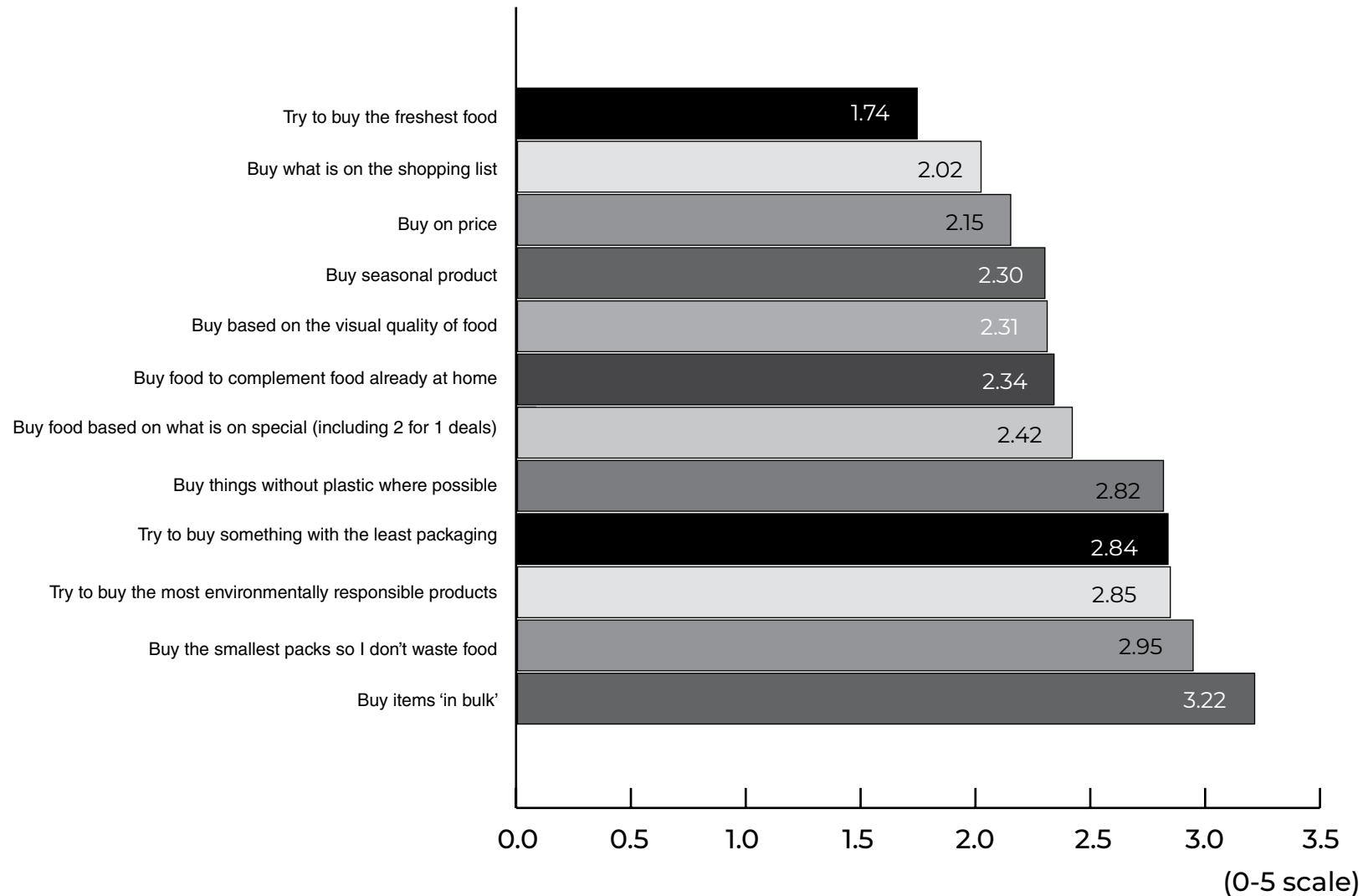
Plan the meals to be cooked



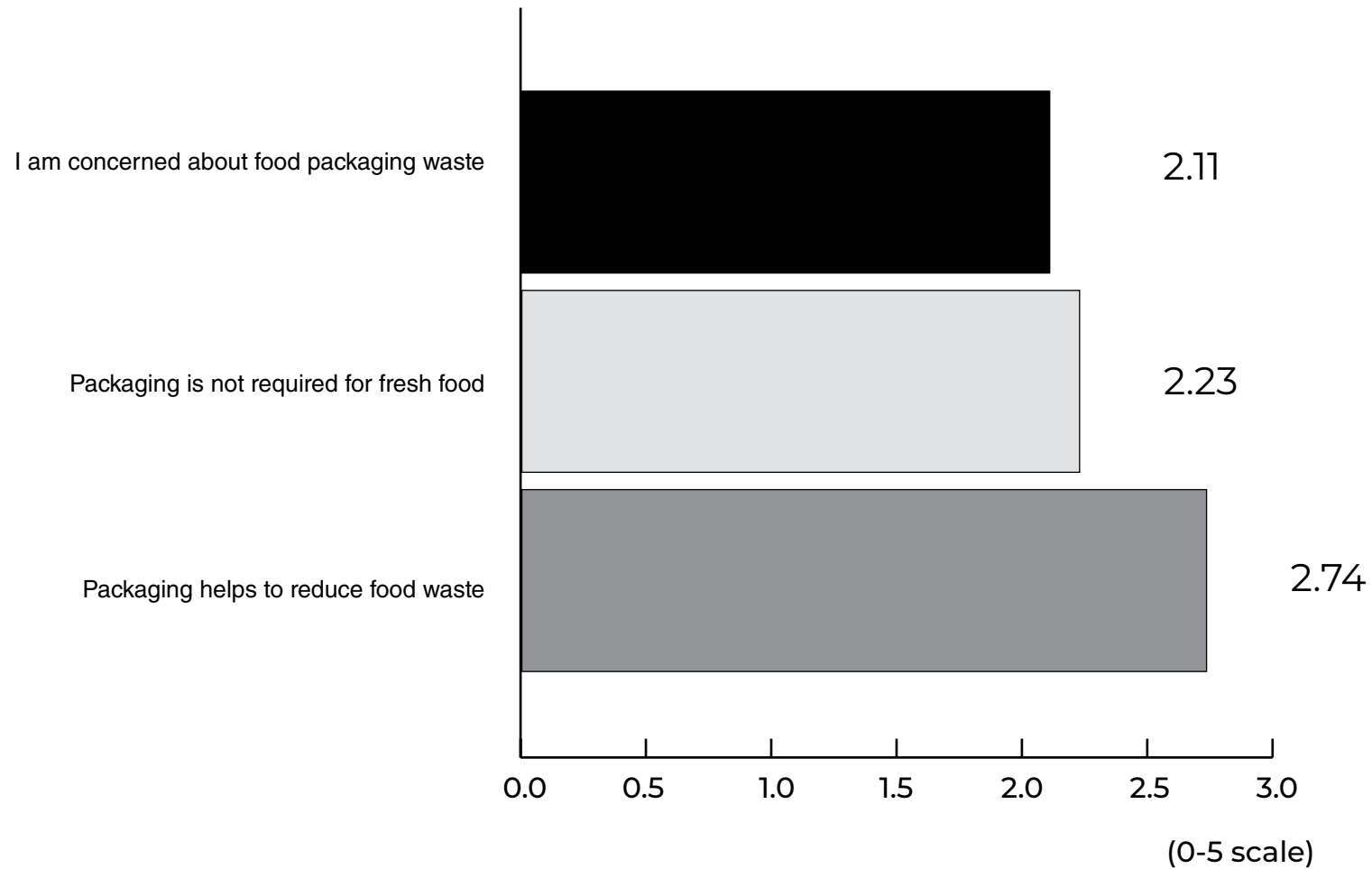
Q12: Please rank the top 5 food issues that matter to you [N.B. Rank 1-5 with 1 being the issue that matters the most]



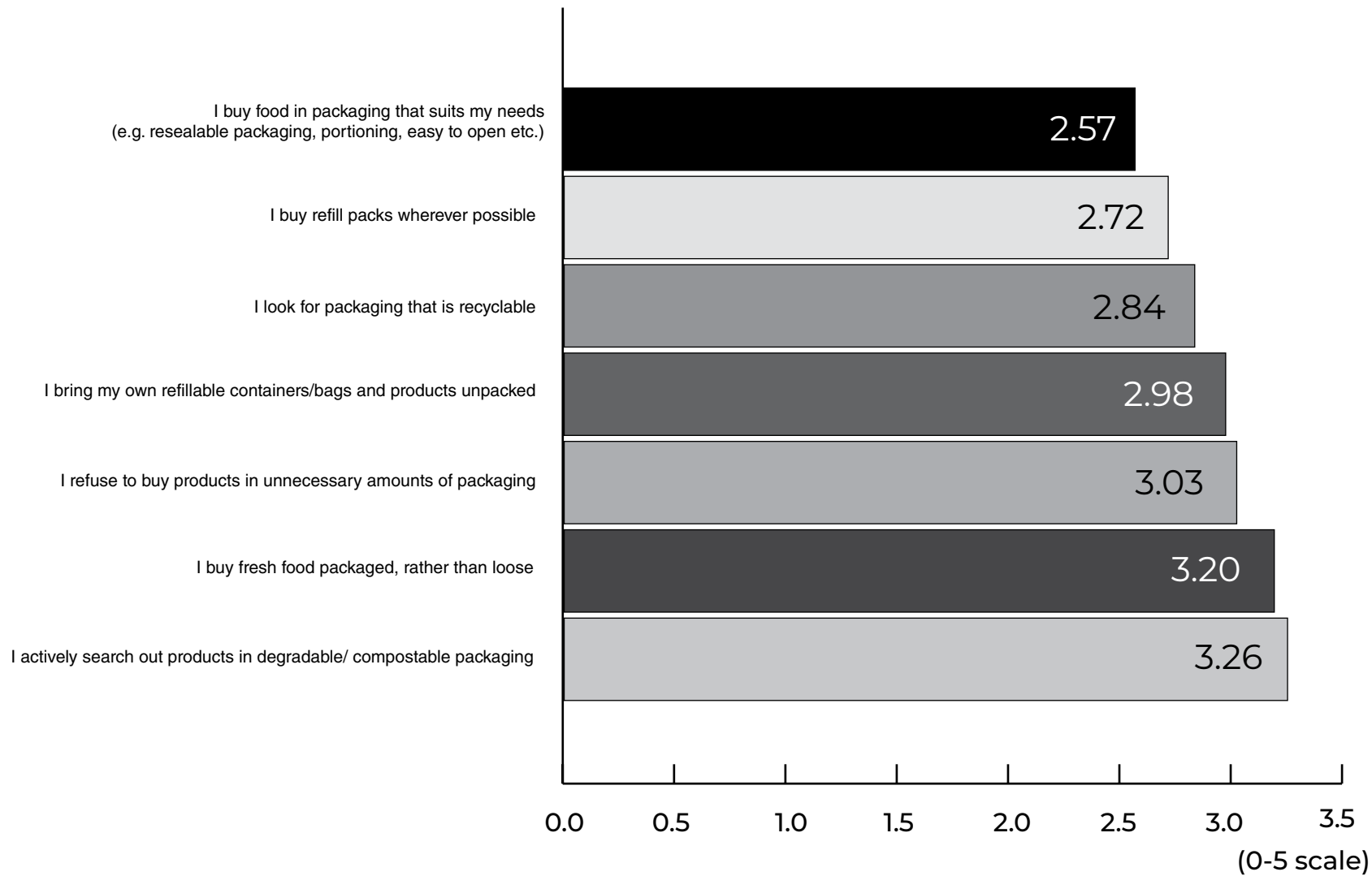
Q13: How often do you do the following when doing the main grocery shopping?



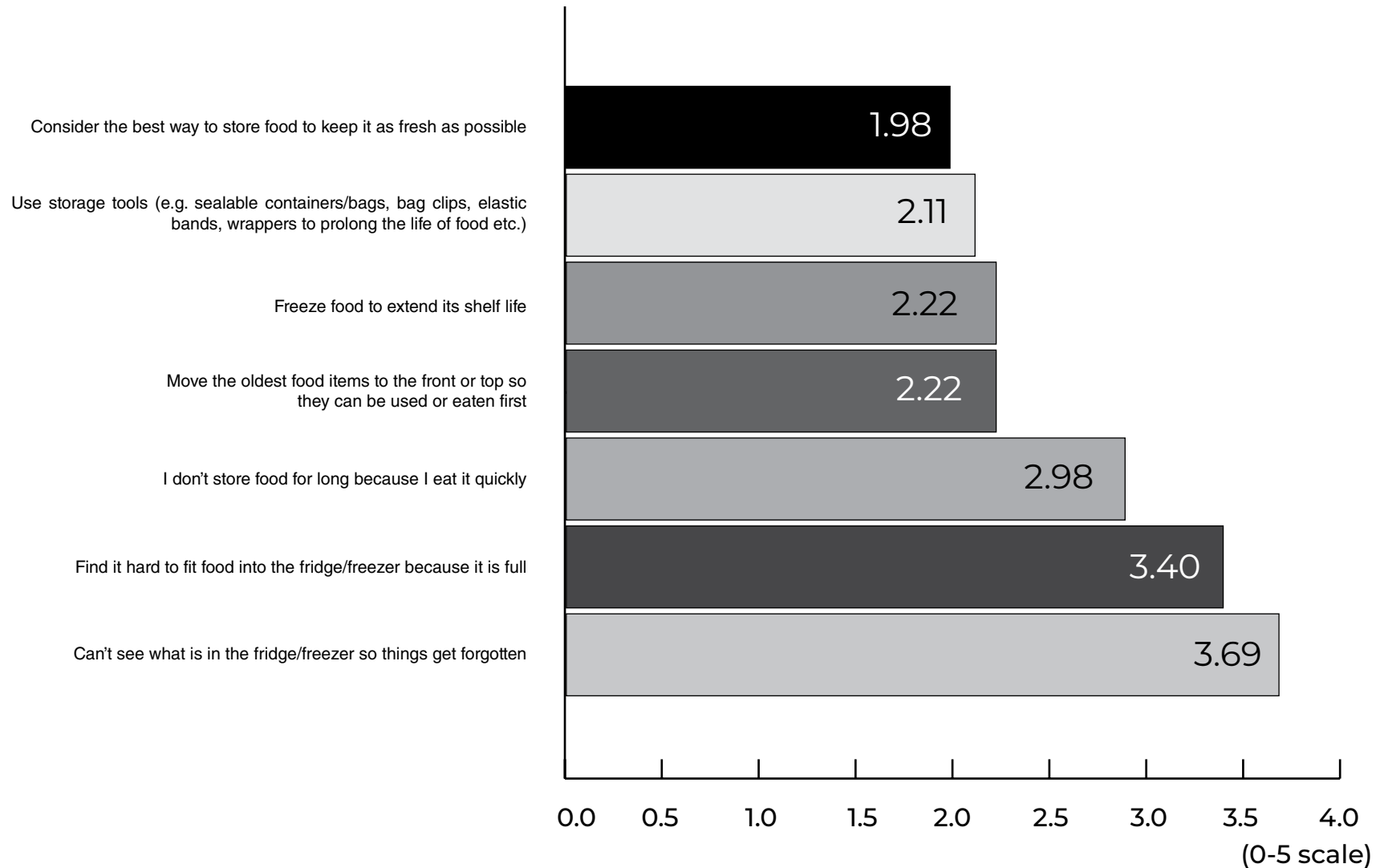
Q14: Here are some statements. Please tell us to what extent do you agree / disagree with each one.



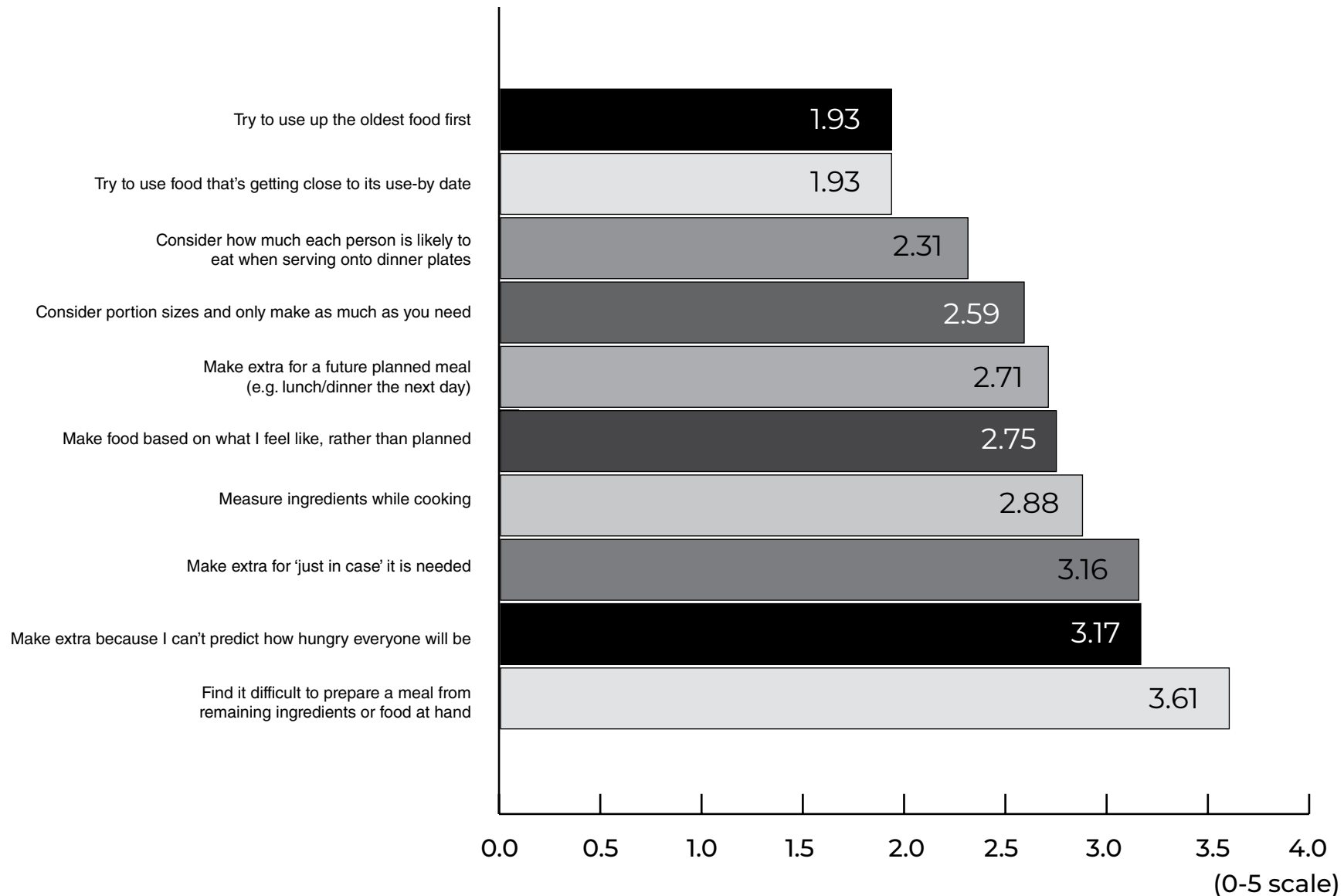
Q15:How often do you do the following when it comes to food shopping?



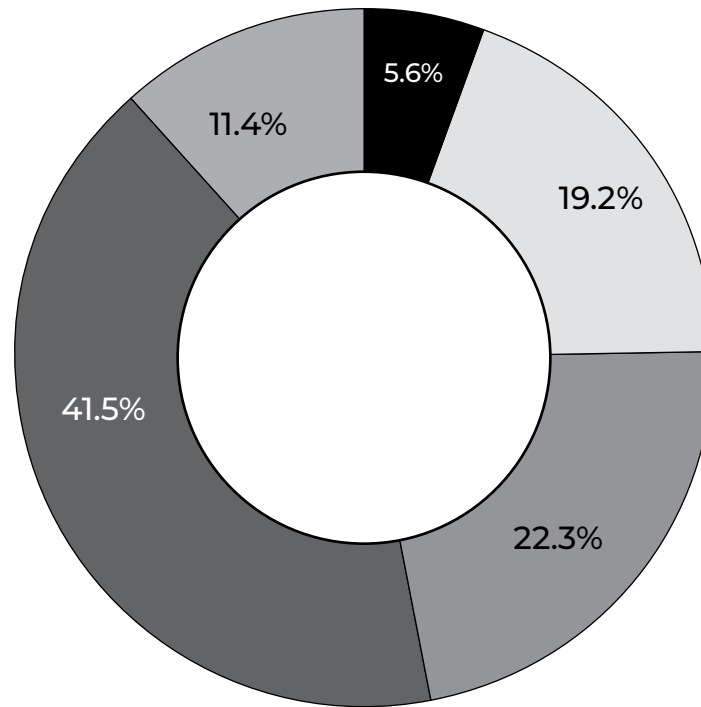
Q16: When storing food, about how often do you (including your household) do the following?



Q17: How often do you do the following when preparing a main meal?

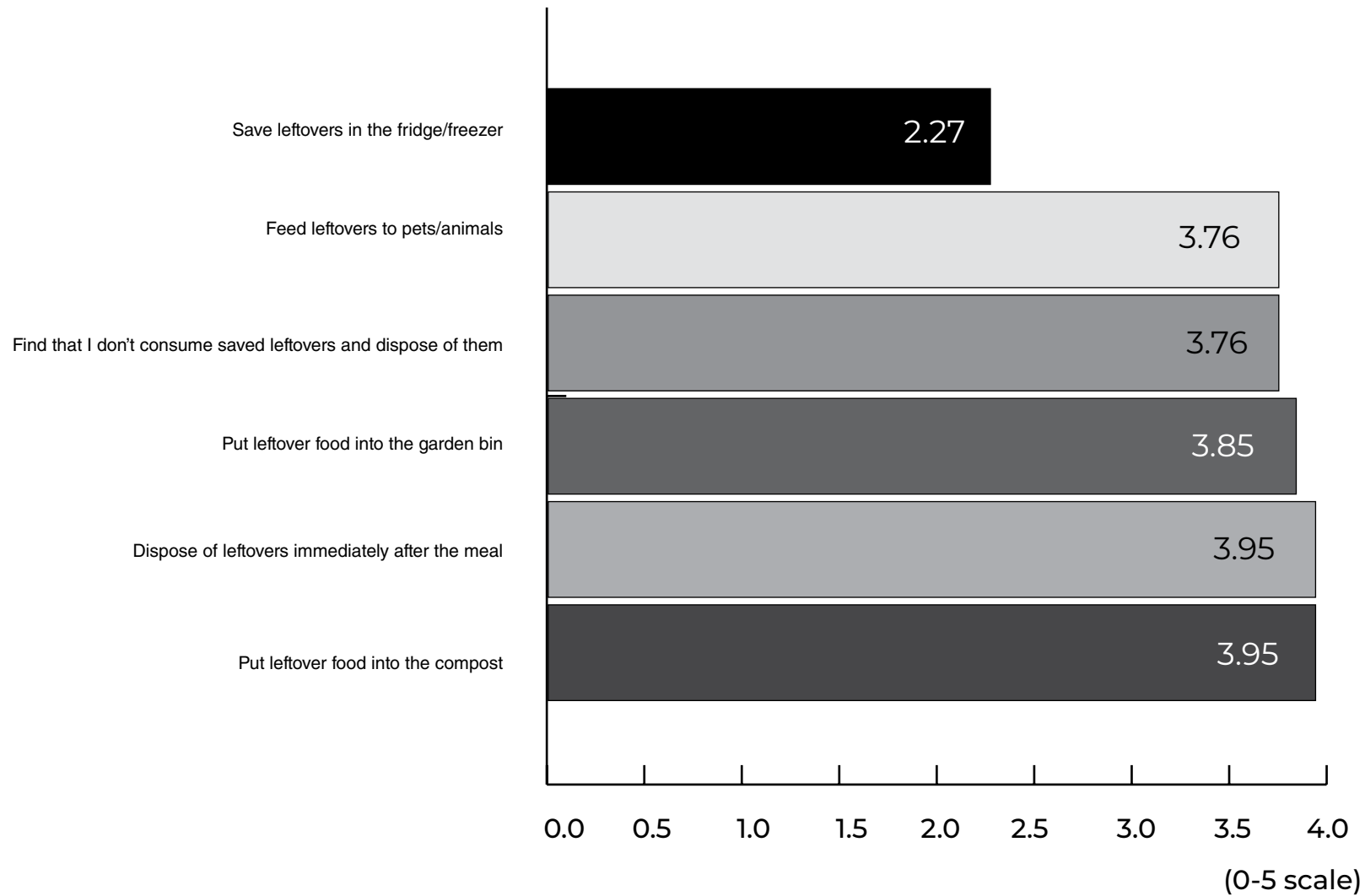


Q18a: How often are there unplanned leftovers after meals in your household?
(e.g. not leftovers that were cooked with the intention of storing / eating later)



■ Everytime ■ Most times ■ About half the time ■ Sometimes ■ Never

Q18b:When there are unplanned leftovers, how often do you do the following?

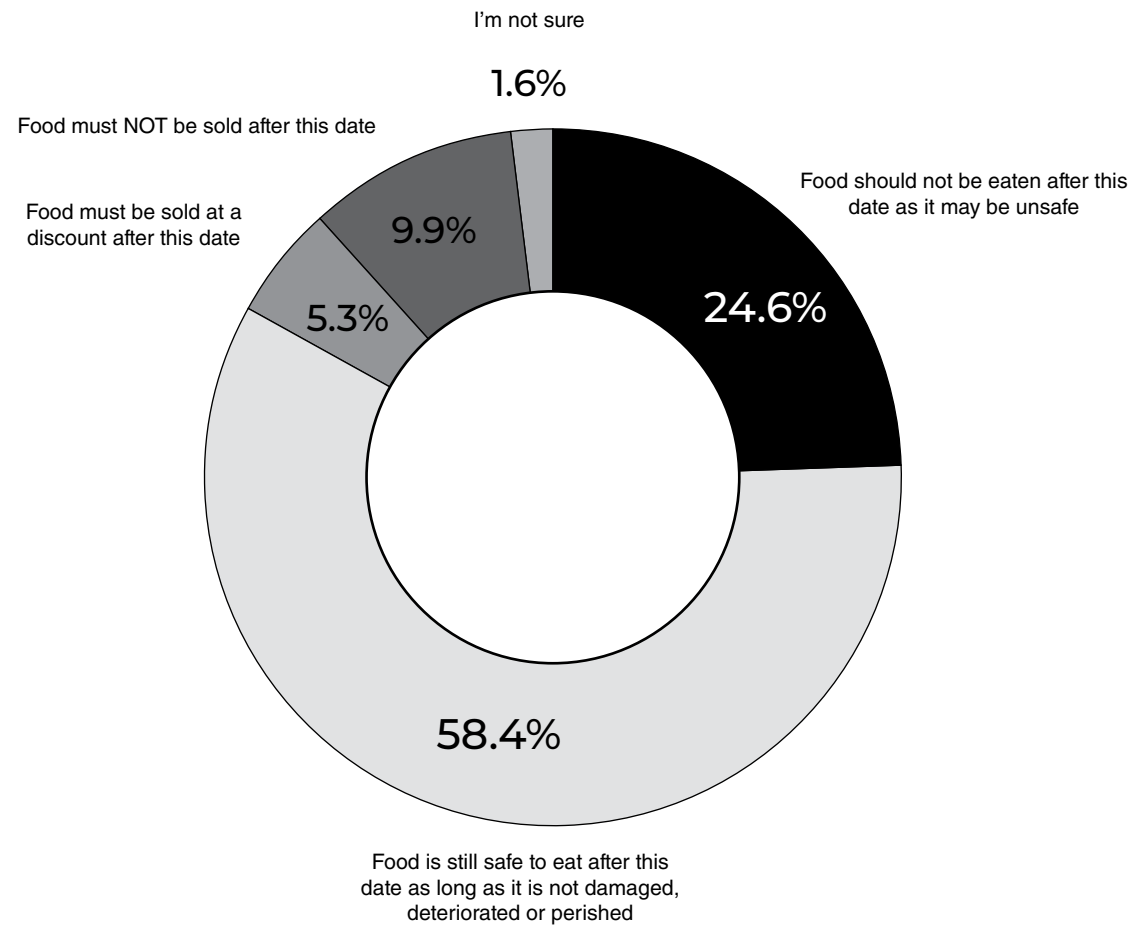


Q18c: Estimate the amount (measured in cups) of LEFTOVER food that is thrown out in a typical week in your household. Please enter a whole number (e.g. between 0 - 99)

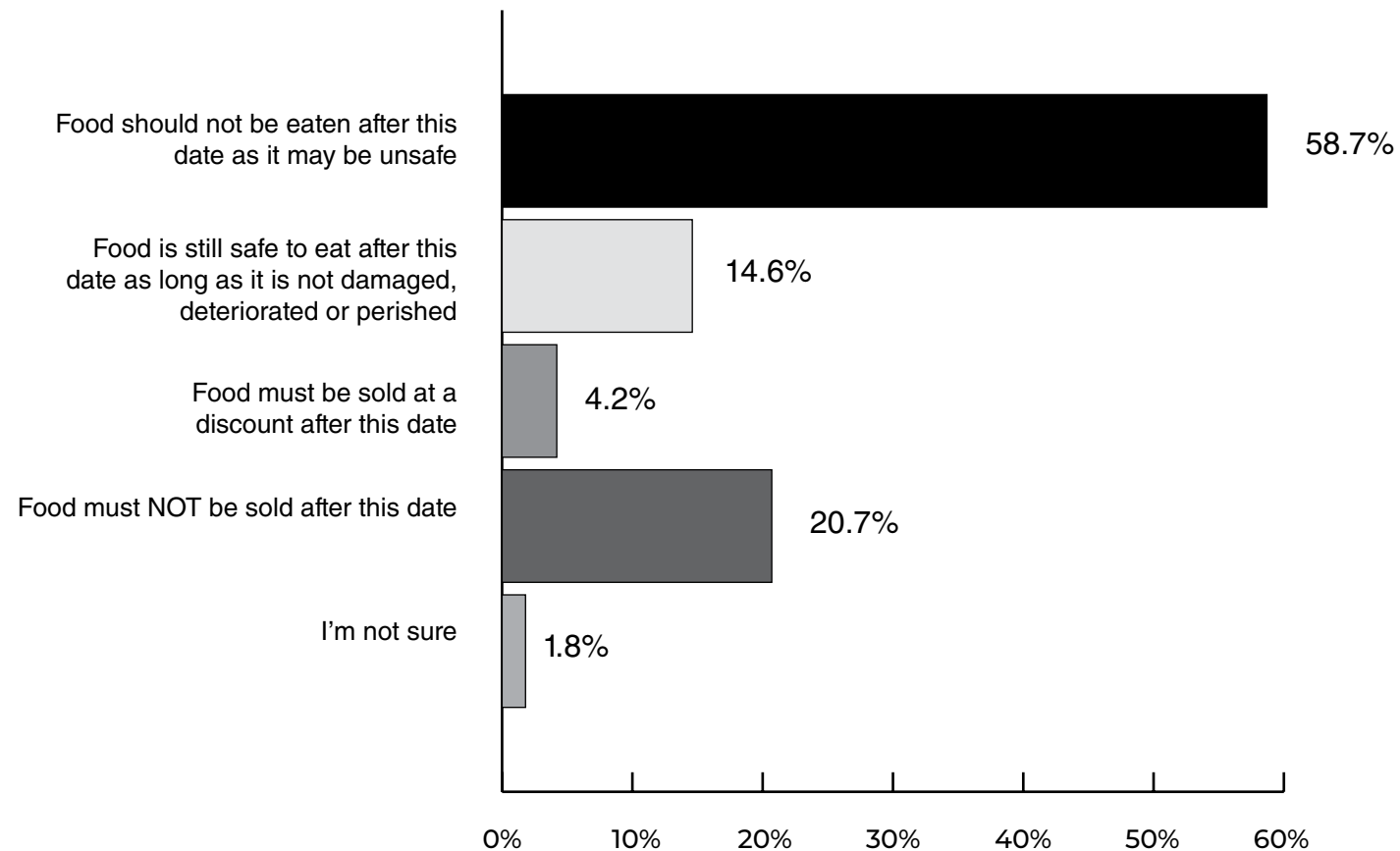
Number of cups left over each week

Mean	7.81
Medium	3
Mode	2
High	88
Low	0
Sum	7017.5

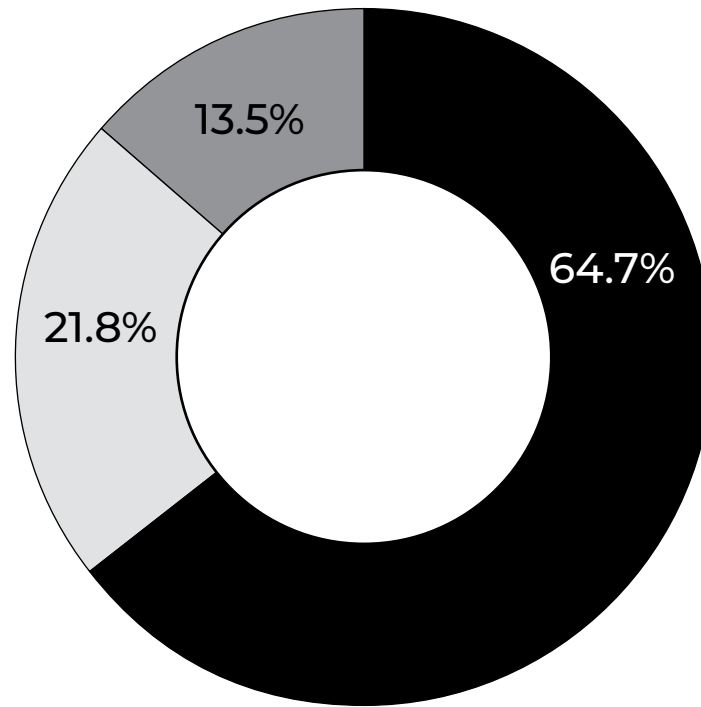
Q19a:What does the term 'best-before' mean relating to food / drink date labeling?
Select the most relevant option.



Q19b: Now looking at the list again, what does the term 'use-by' mean relating to food / drink date labeling? Select the most relevant option.



Q20: How motivated are you to reduce your household's food waste?

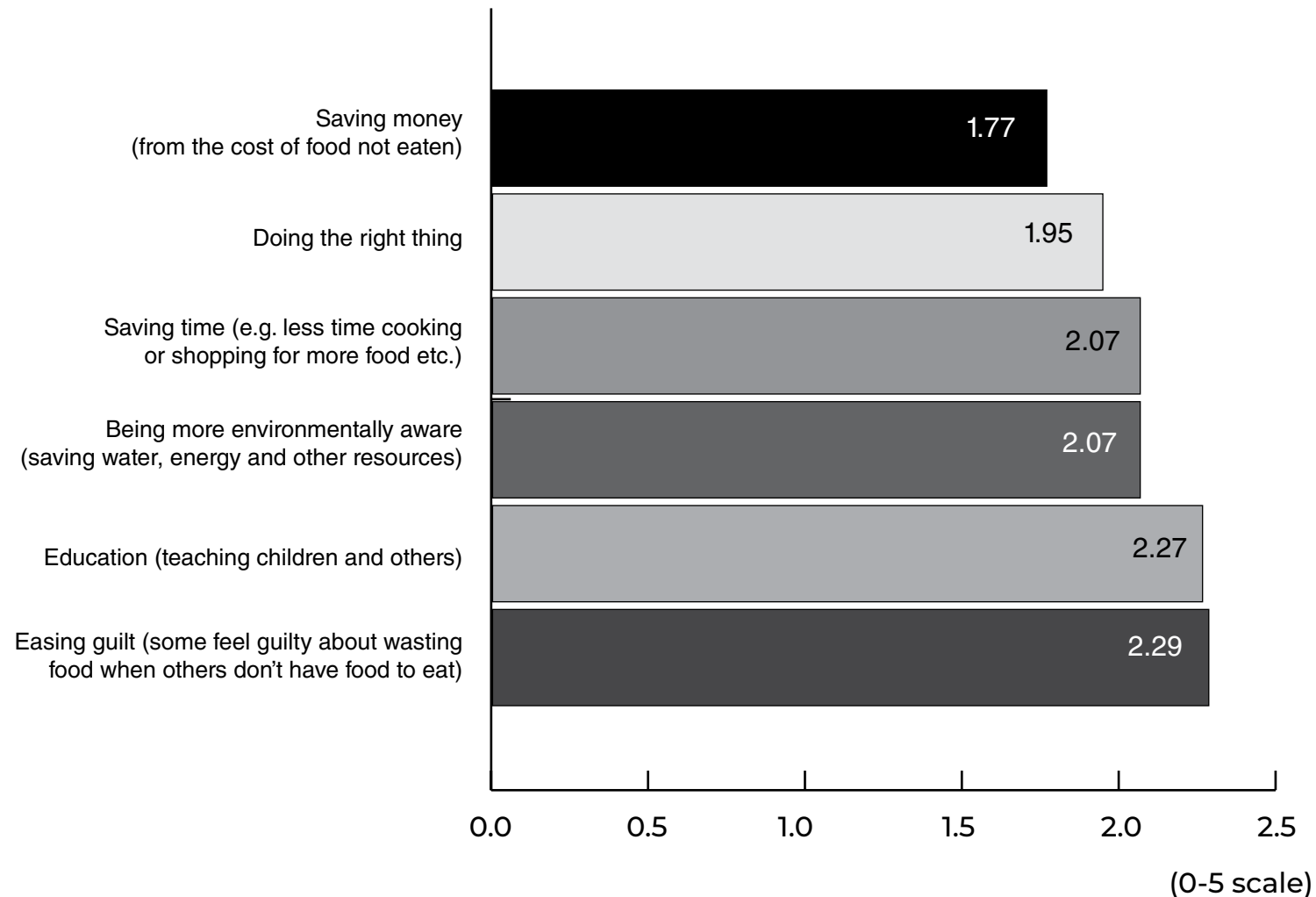


■ Unmotivated

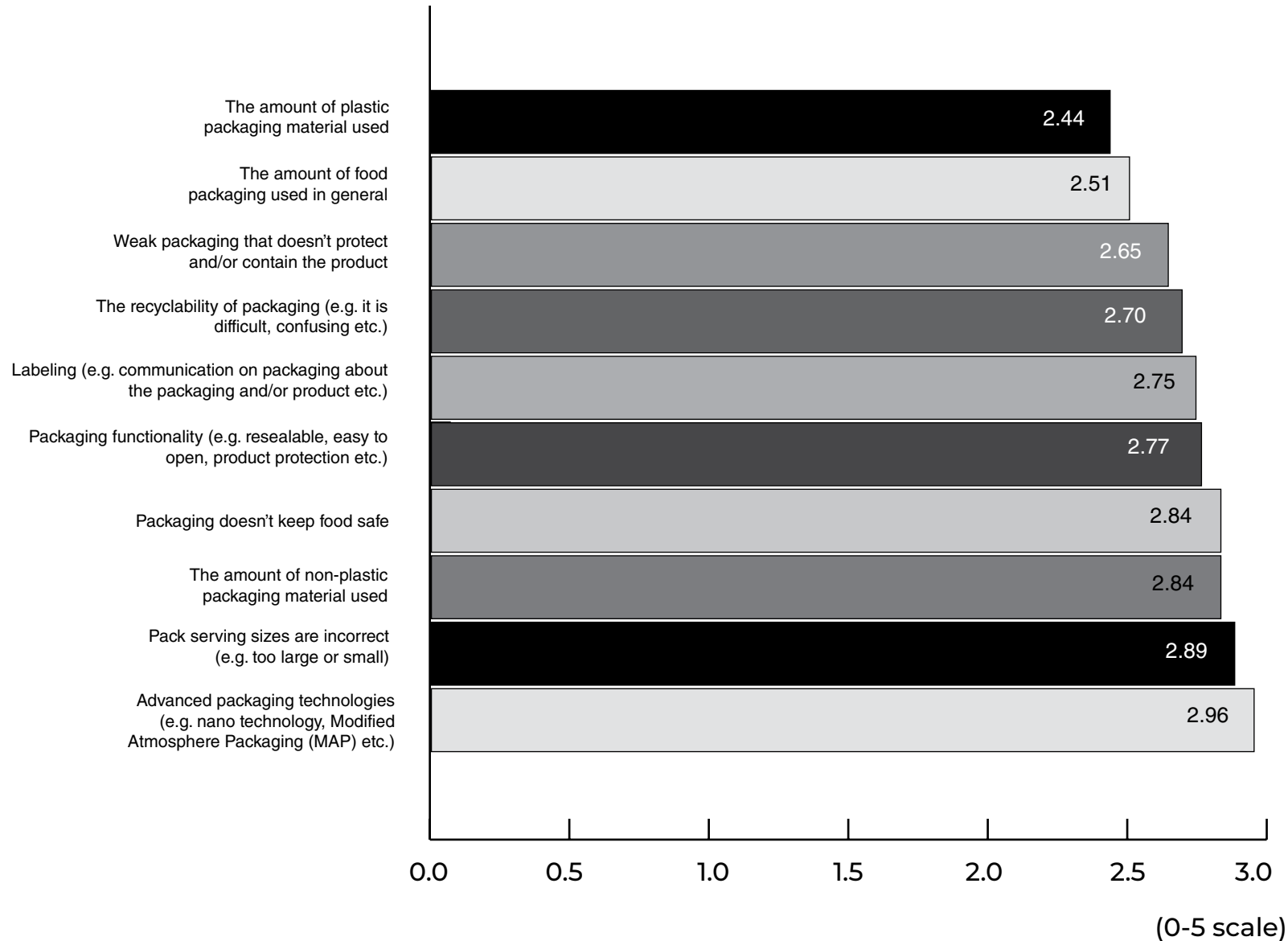
■ Passive

■ Motivated

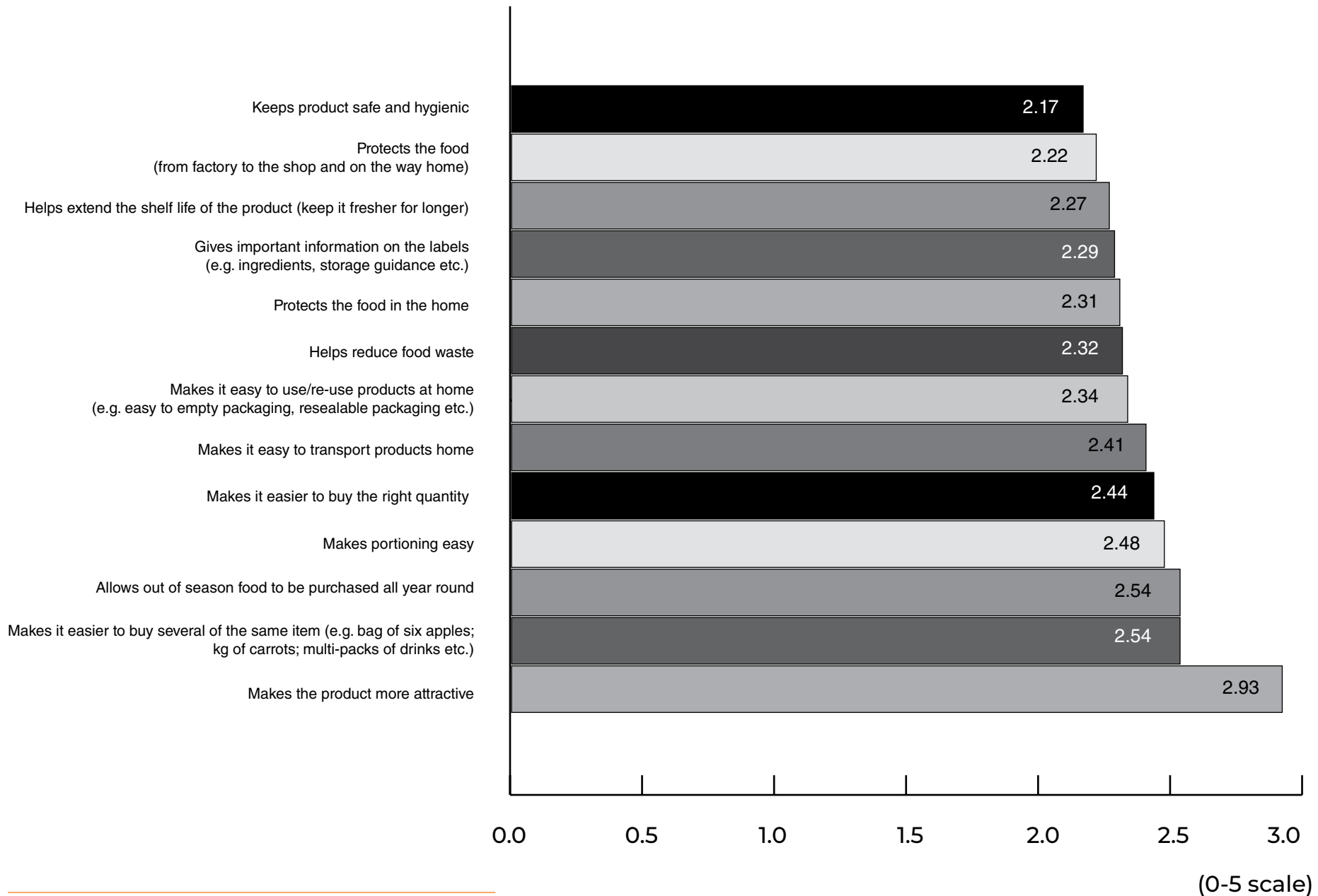
Q21:If you were to change anything about the way you manage the food that you personally throw away, what would motivate you to make that change?



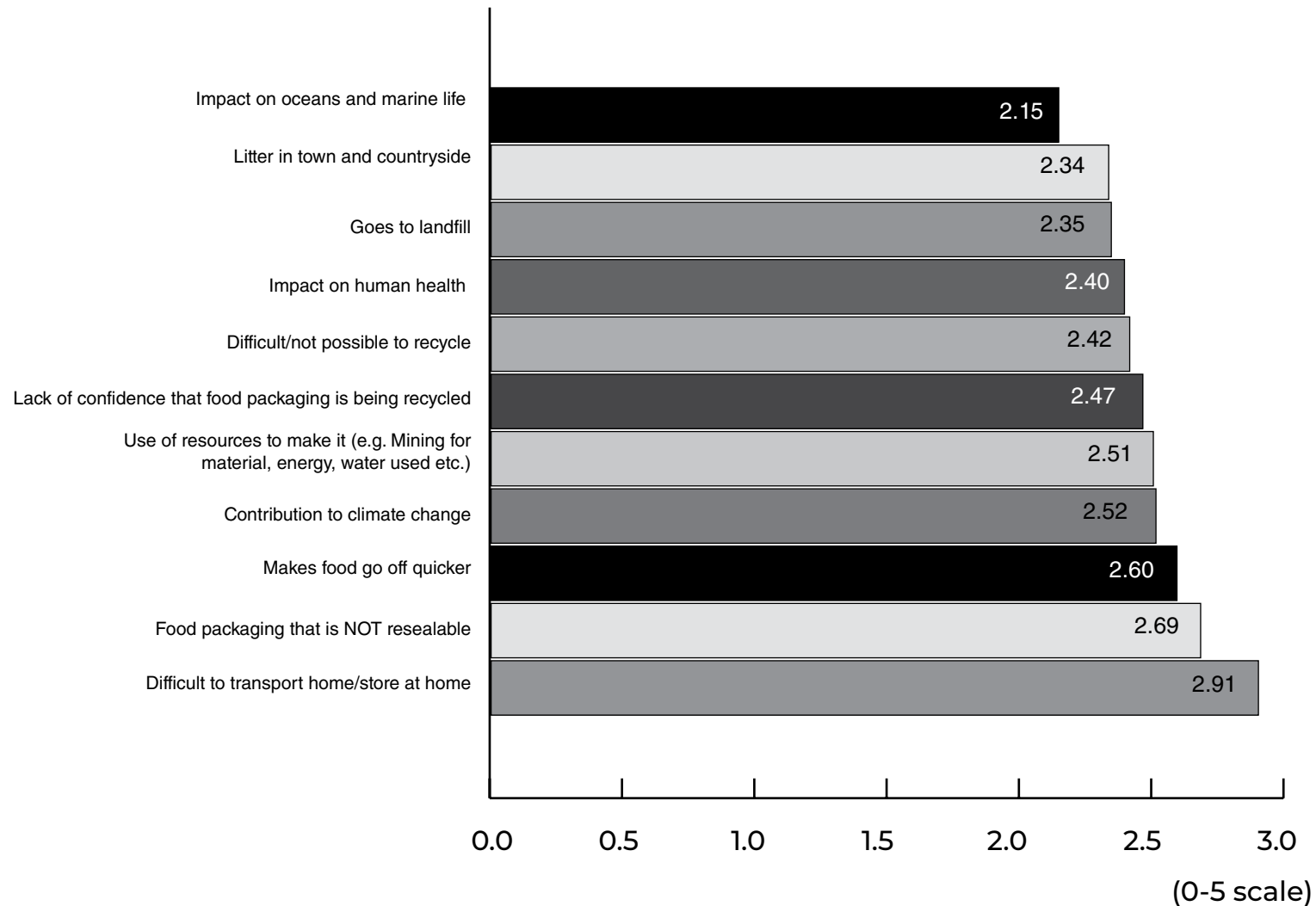
Q23:How concerned are you when it comes to the following food packaging matters?



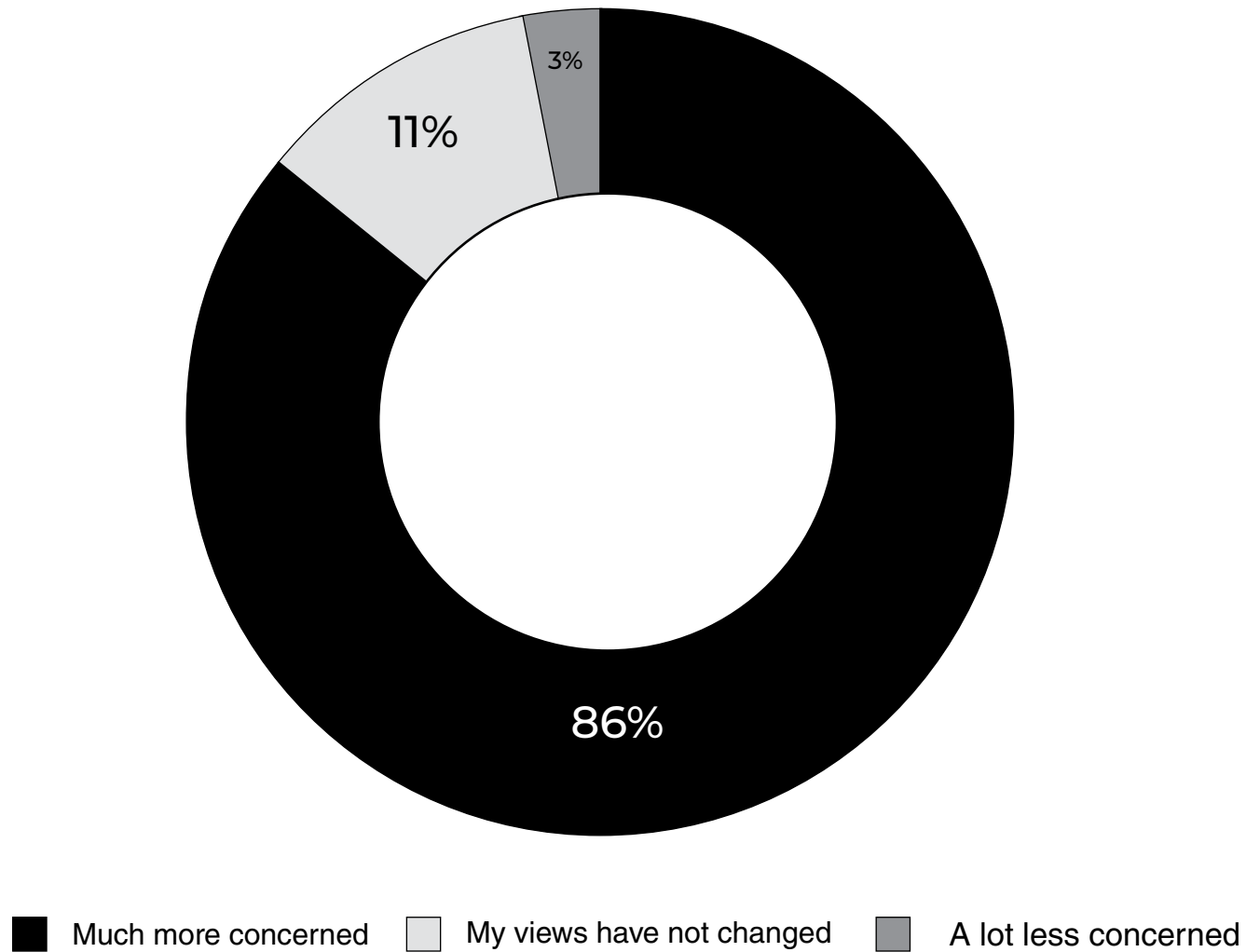
Q24: Rate the benefits of the following packaging functions.



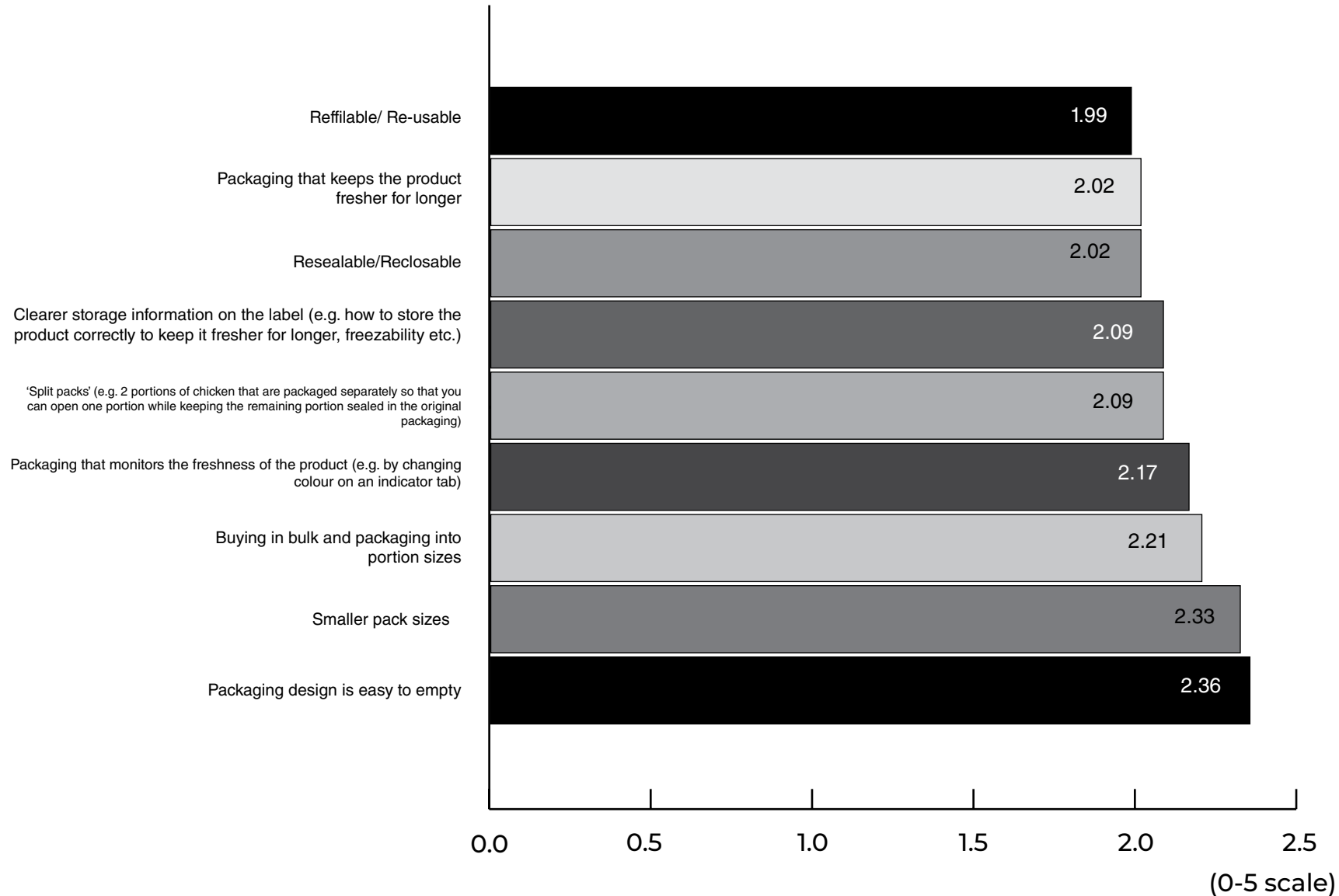
Q25: How concerned, if at all, are you about the following aspects of food packaging?



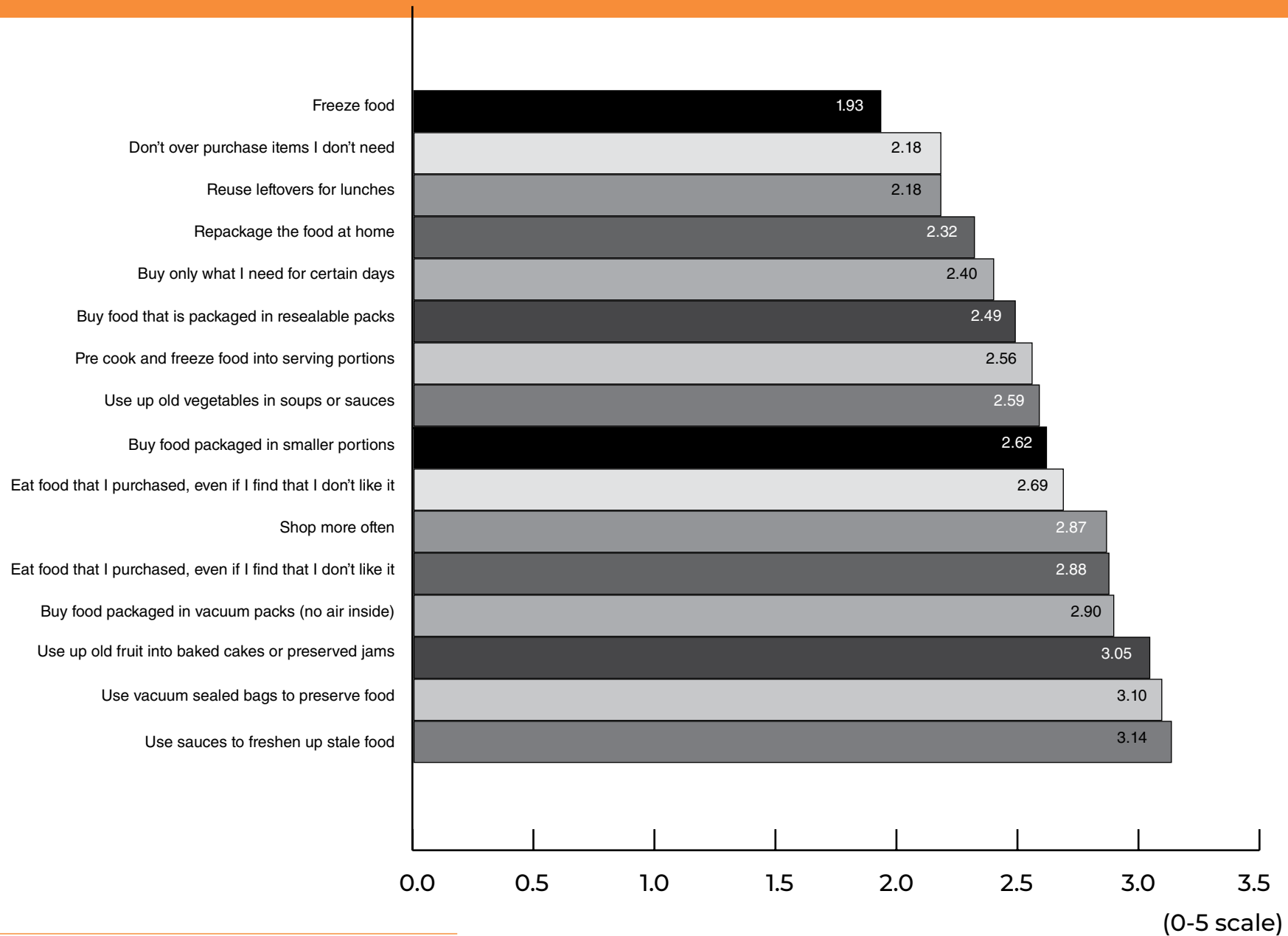
Q26: Have your views towards food waste changed in the past year, if at all?



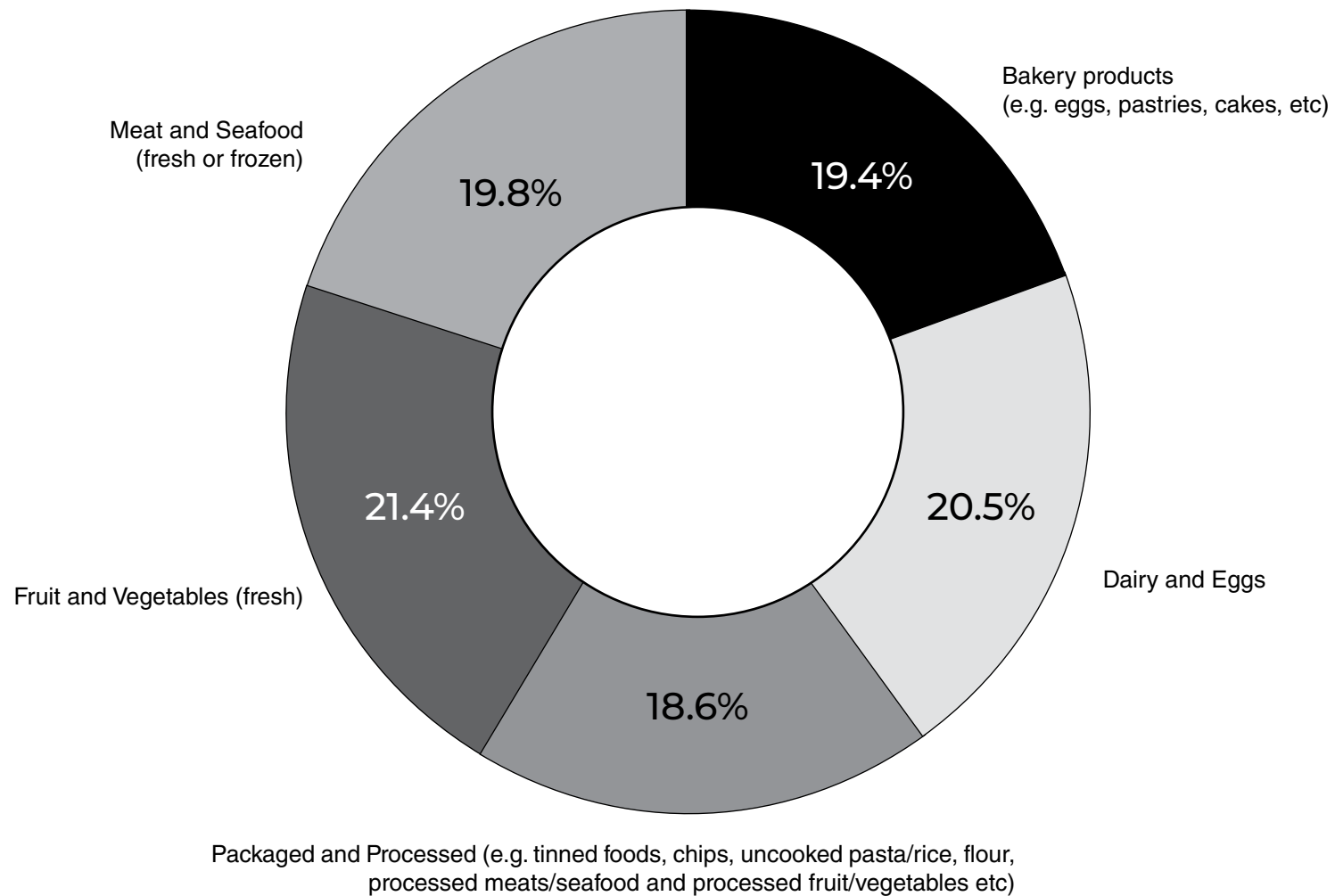
Q27: To what extent do the following food packaging features have the ability to reduce food waste?



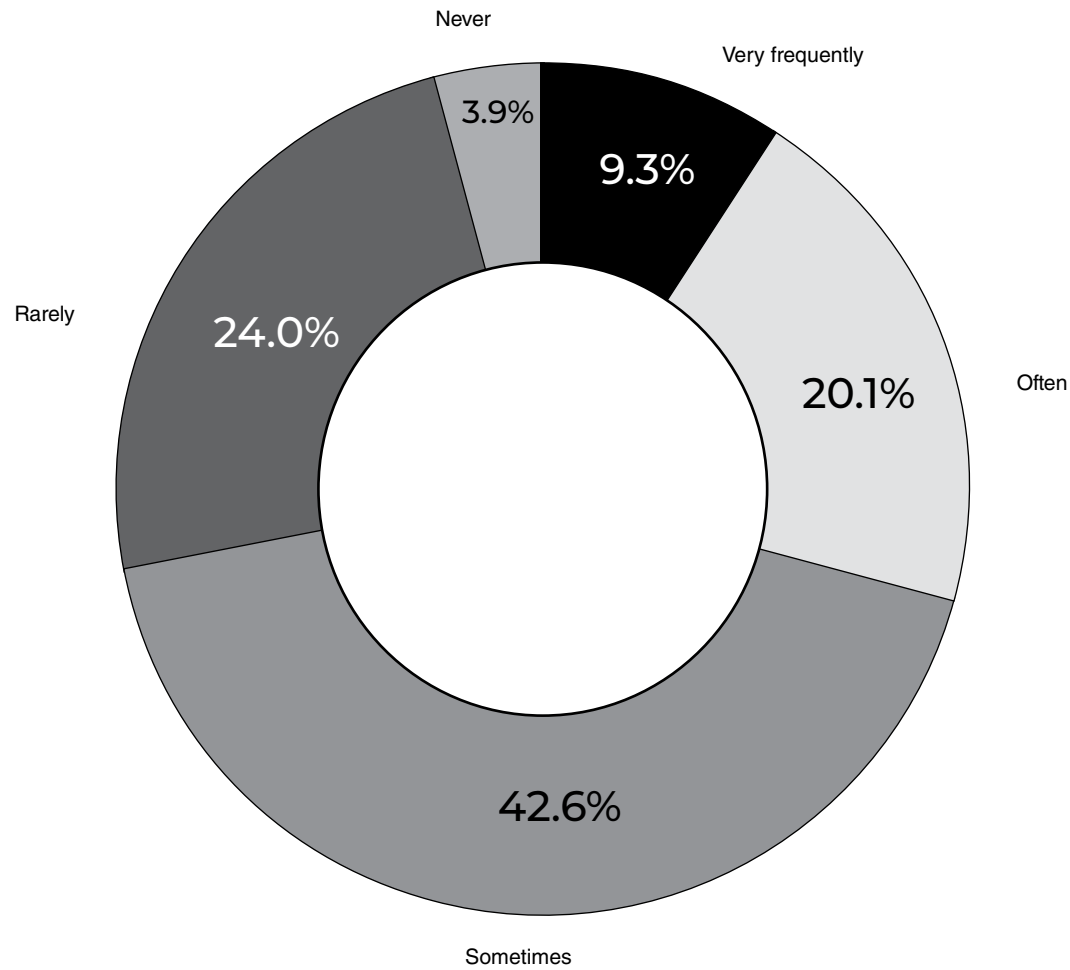
Q28: How often do you use these strategies to attempt to consume all food purchased in your household?



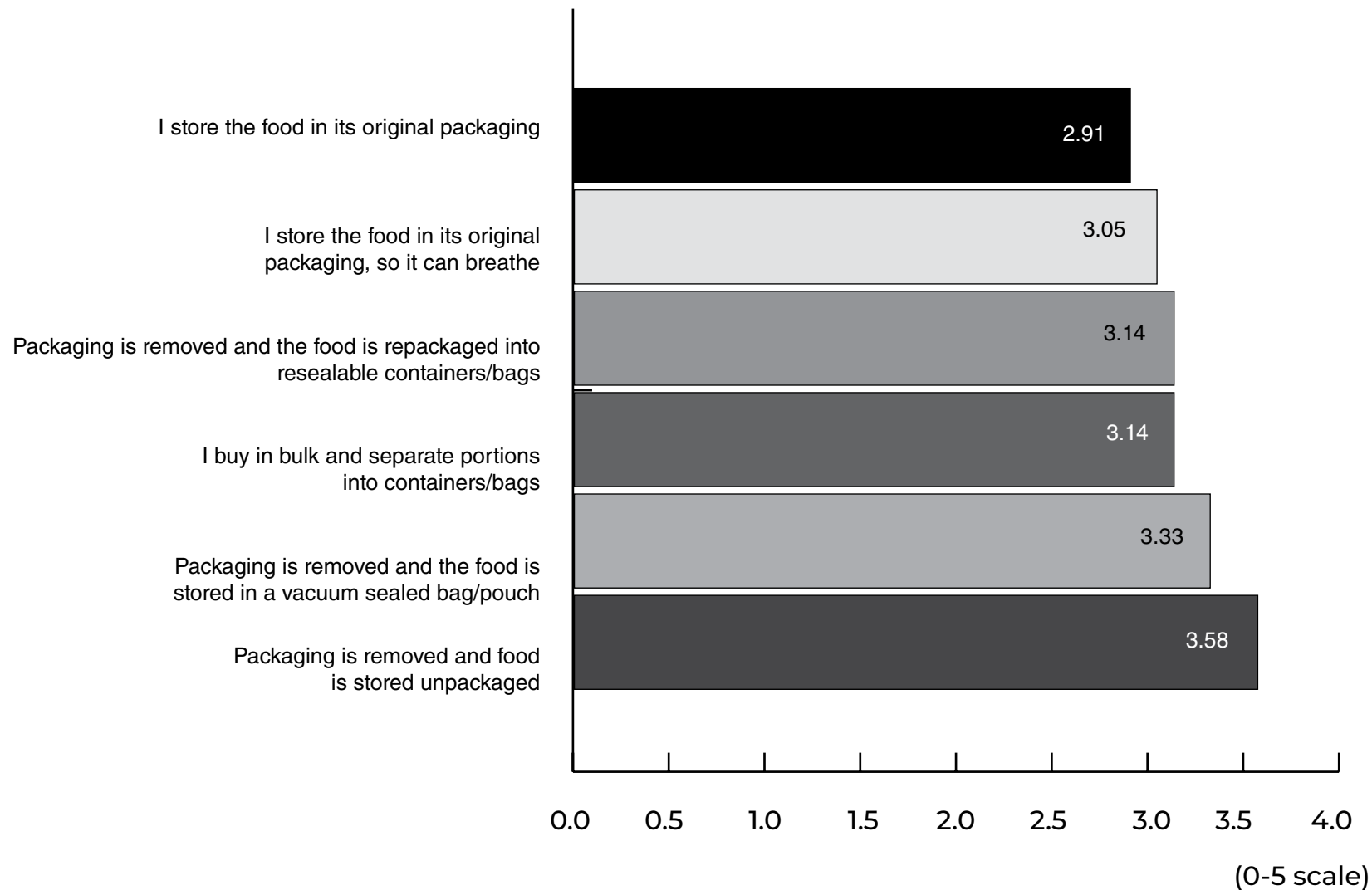
Q29: Which of the following food categories do you regularly purchase / consume (at home) at least once a fortnight?



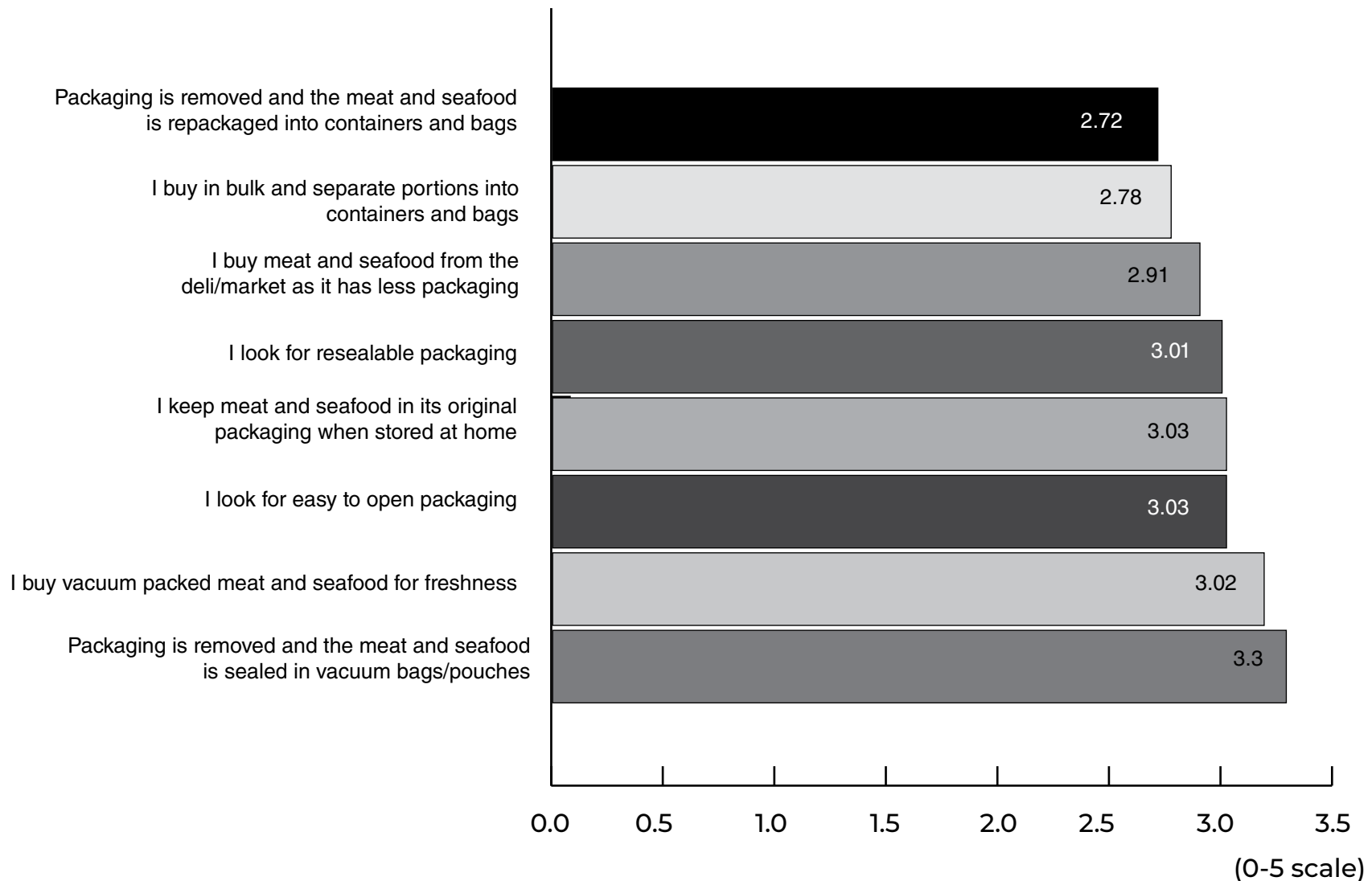
Q30ai: How often do you purchase fresh fruit & vegetables in packaging?



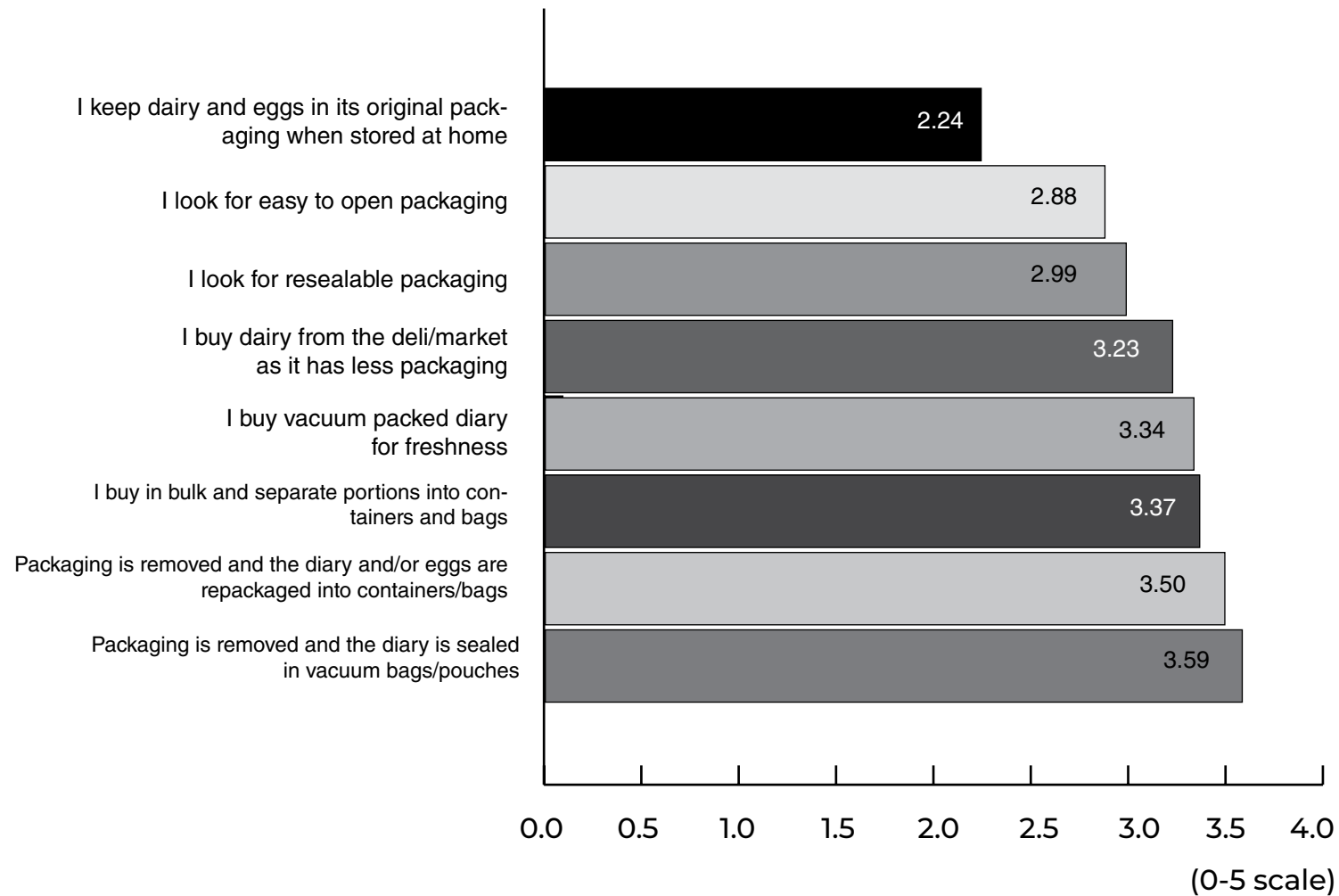
Q30aii: From the list, what do you do with fresh fruit & vegetable produce after it has been purchased?



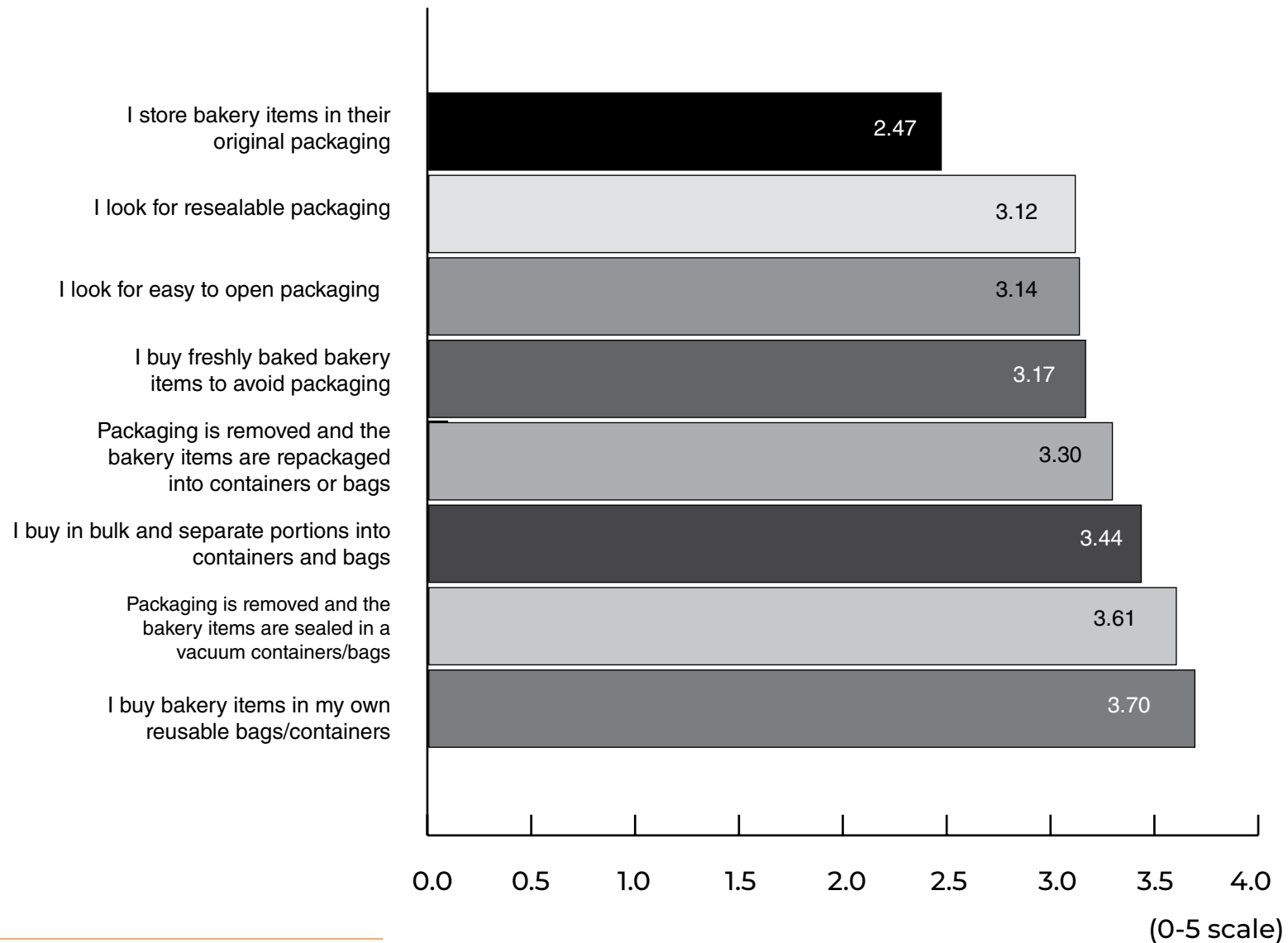
Q30b: From the list, what do you do with meat & seafood products after they have been purchased?



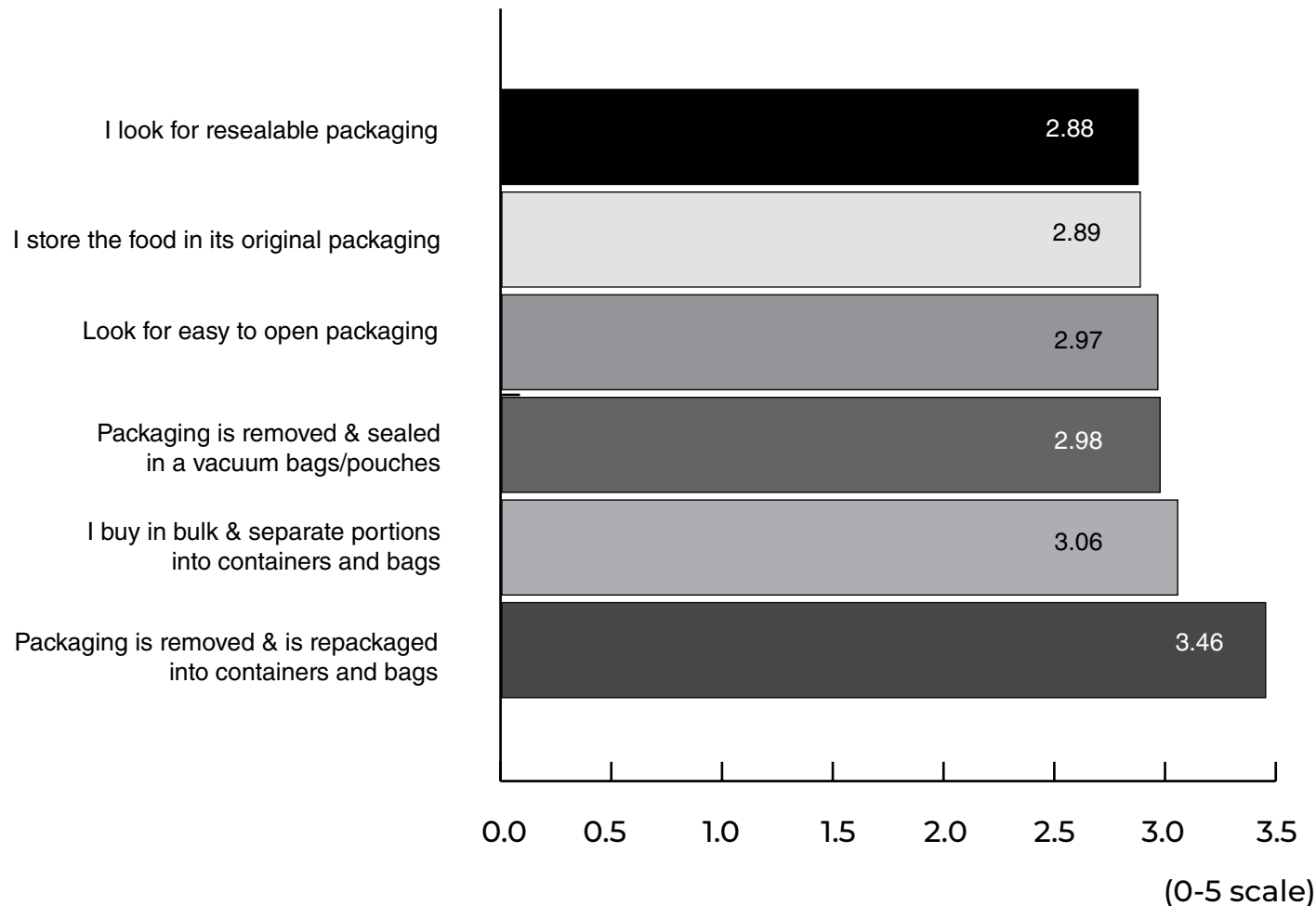
Q30c: From the list, what do you do with dairy & egg items after they have been purchased?



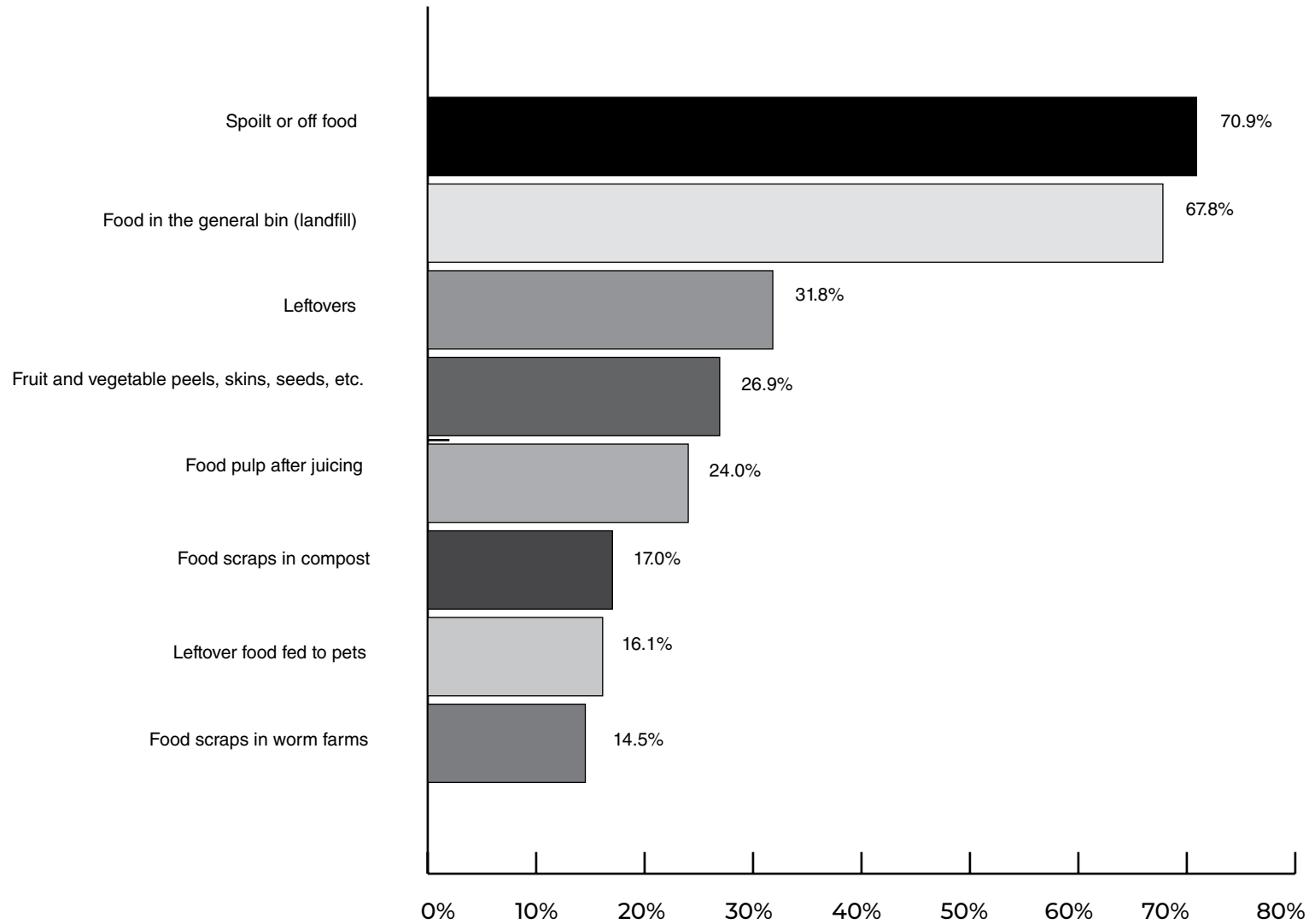
Q30d: From the list, what do you do with bakery items after they have been purchased



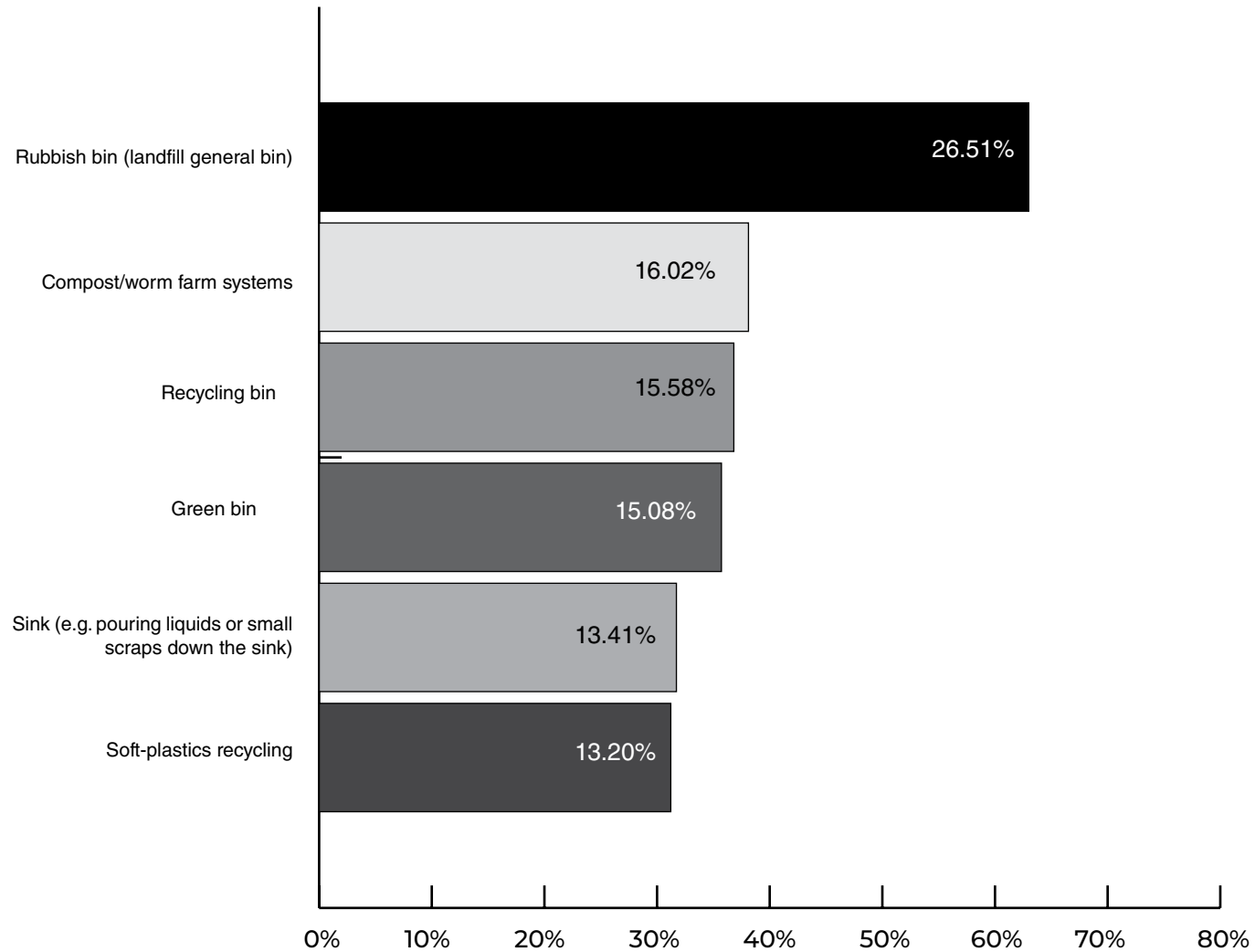
Q30e: From the list, what do you do with packaged & processed food after it has been purchased? Please note that Packaged & Processed food includes; Long life food, tinned food, processed meats, frozen vegetables, biscuits, flour, coffee, cereal, potato chips, uncooked rice / pasta etc.



Q31: Which of the following do you consider to be food waste? Select all that apply.



Q32: Which of the following do you consider to be a waste destination? Select all that apply.

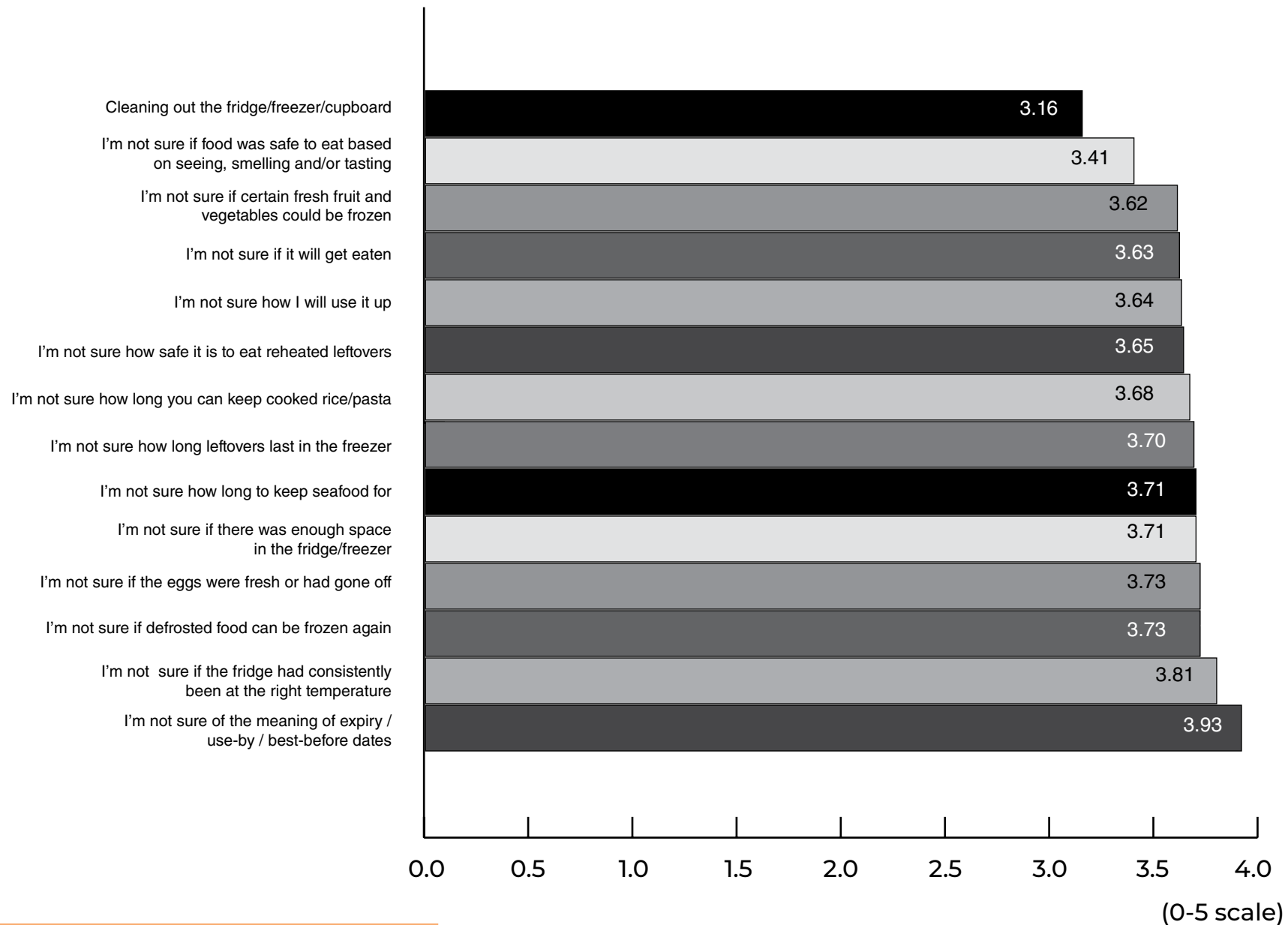


Q33: For the following, estimate the amount (in whole cups) of TOTAL edible food that is thrown out in a typical week.(e.g. Solid / liquid food left on dinner plates, food that is thrown into the compost, green bin, waste bin, tipped down the sink, fed to pets etc.)

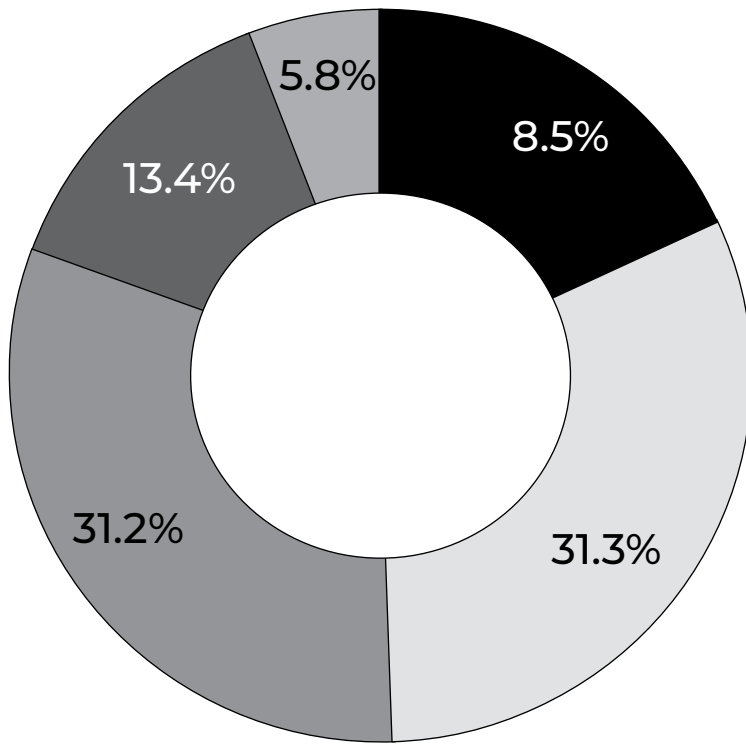
Number of cups of edible food thrown out each week

	Bakery (e.g. Bread, muffins, cakes, pastries, etc)	Fruit & Vegetables (e.g. apples, potatoes, salad items, herbs, etc.)	Meat & Seafood (e.g. Chicken, beef, mince, fish, sausages, etc.)	Dairy & Eggs (e.g. Milk, cheese, eggs, butter, yoghurt etc.)	Packaged & Processed (e.g. Long life food, tinned food, processed meats, frozen vegetables, biscuits, flour, coffee, cereal, potato chips, uncooked rice/pasta etc.)
Mean	1.25	1.70	1.35	1.06	1.42
Median	1	1	0	0	0
Mode	0	1	0	0	0
High	78	47	50	55	74
Low	0	0	0	0	0
Sum	1264	1725.2	1372.2	1073	1444.7

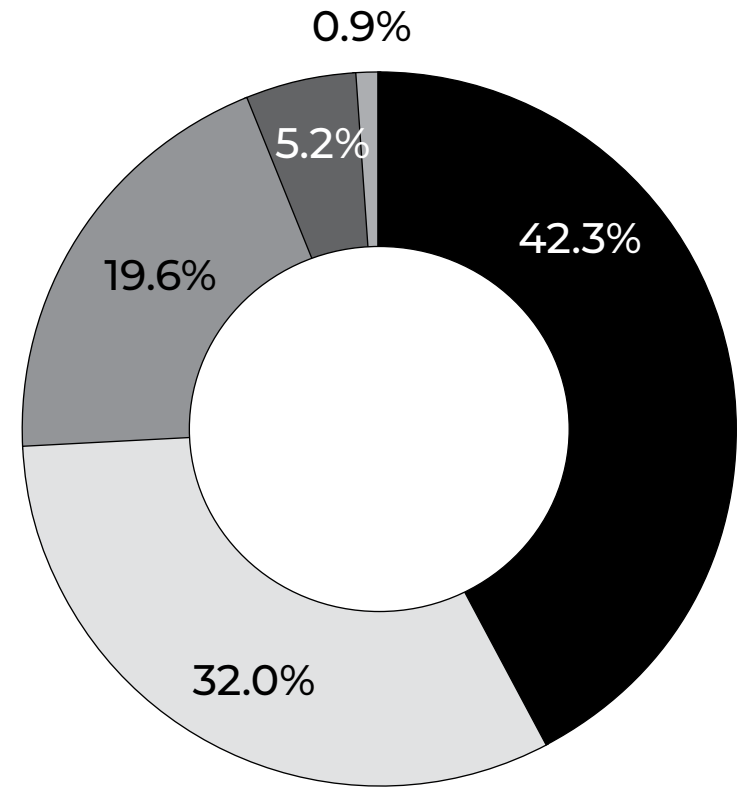
Q34: From the listed reasons, how often do you dispose of food? Please consider the last 2 months.



Q35: How do you rate each of the following as an environmental issue?



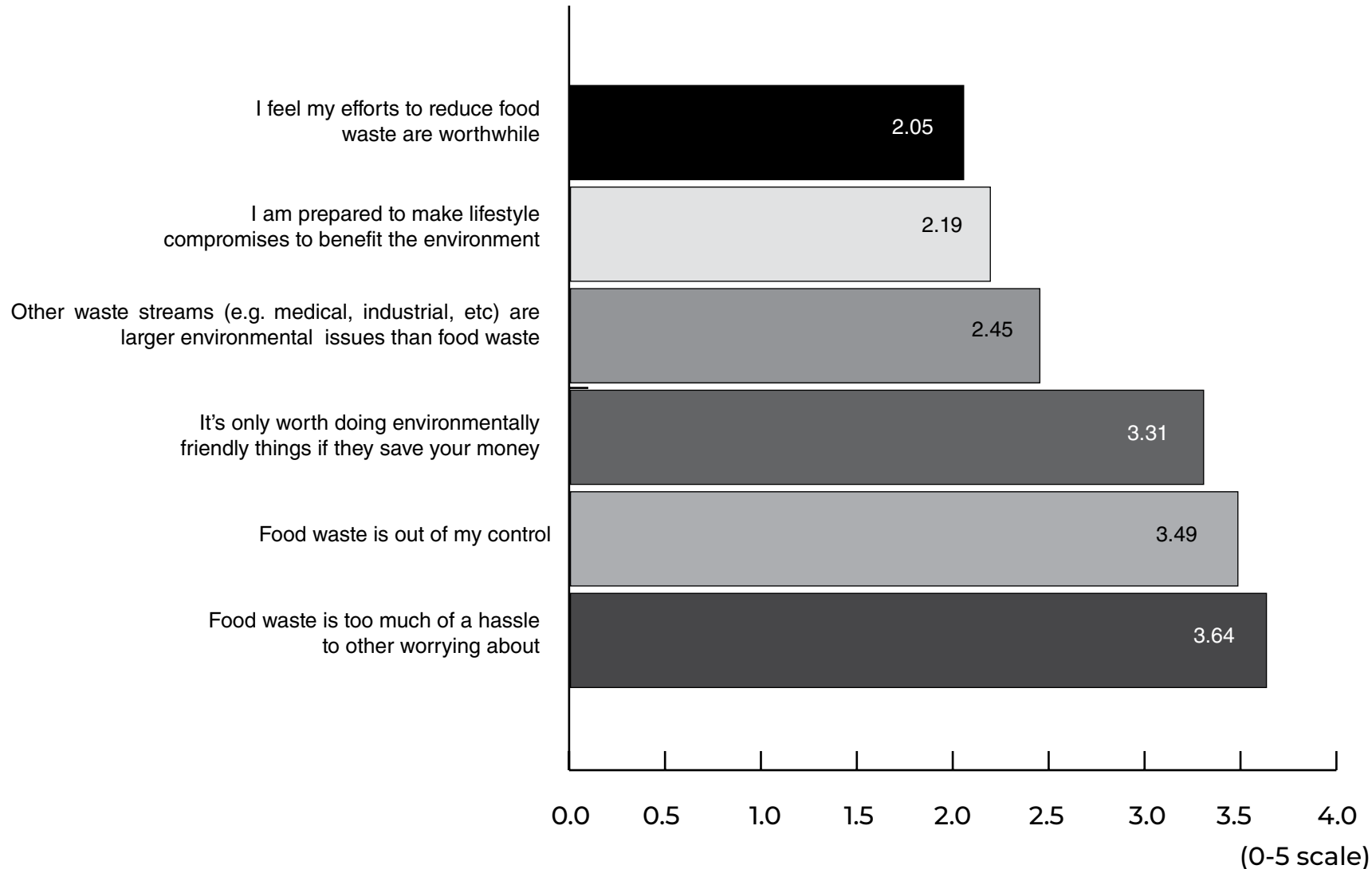
Food waste rating



Plastic packaging rating

■ Extreme environmental issue ■ Large environmental issue ■ Moderate environmental issue ■ Small environmental issue ■ NOT an environmental issue

Q36: Here are some statements people have made about themselves. Please select how much you agree / disagree with each one.



About this project

Understanding the perception and use of packaging by consumers and how this plays a role in household food waste generation is an important first step in this project. With a greater understanding of how people appreciate and use packaging, along with the food waste they generate, we can design improved packaging and communications on food waste avoidance that will ultimately reduce food waste.

This project aims to understand consumer perceptions of the role of packaging in reducing food waste by:

- discovering target areas that will help drive packaging design decisions.
- discovering key consumer behaviours that may be adapted to reduce food waste.
- determining potential consumer responses to labelling and packaging alternatives in relation to food packaging.
- providing formative information for partners' new product development processes.
- designing packaging solutions to reduce food waste.
- designing more effective consumer education
- campaigns to reduce food waste.

The project partners are:

