

# Foods with Attitude

Segmentation and regression analysis of food choice attitudes and food behaviour

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# Food Choice

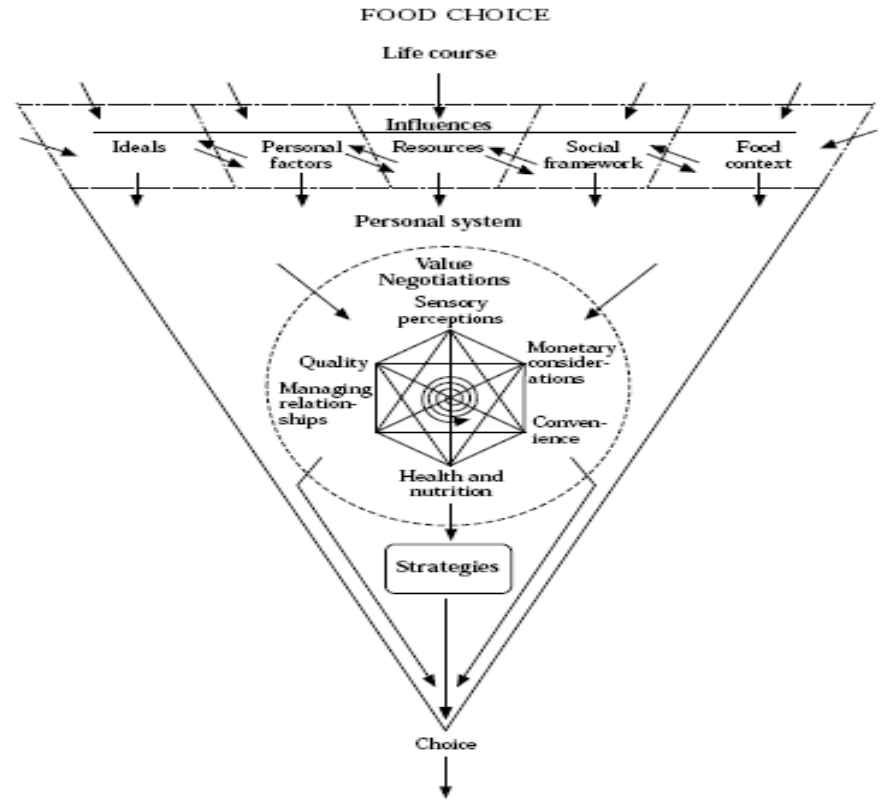
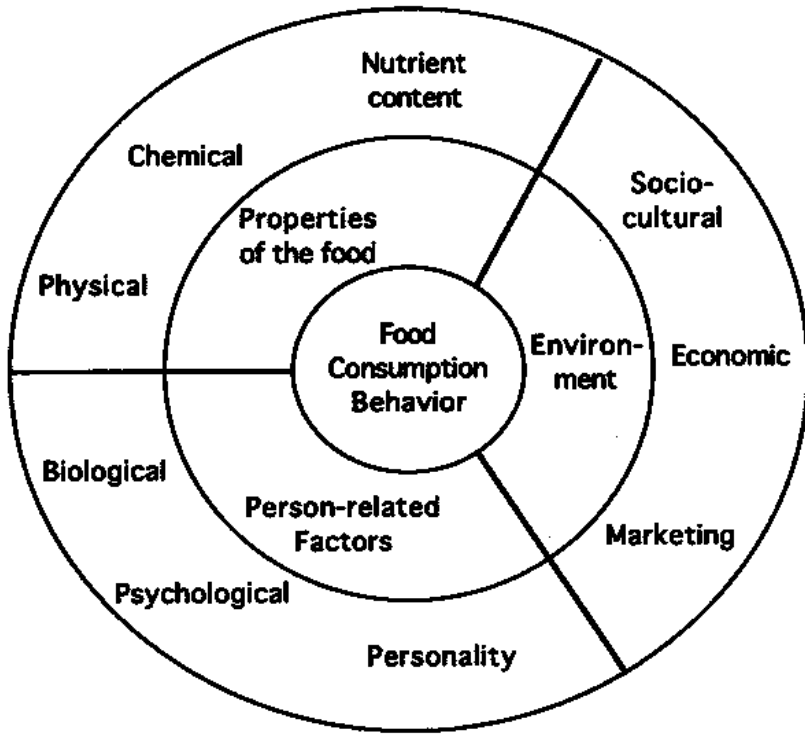
Eating, drinking and food choices are among the most frequent human behaviours

Average consumer makes approximately 200 food decisions each day

Although a simple everyday mundane behaviour, yet highly complex driven by the interaction of many factors related to the person, the food and the environment

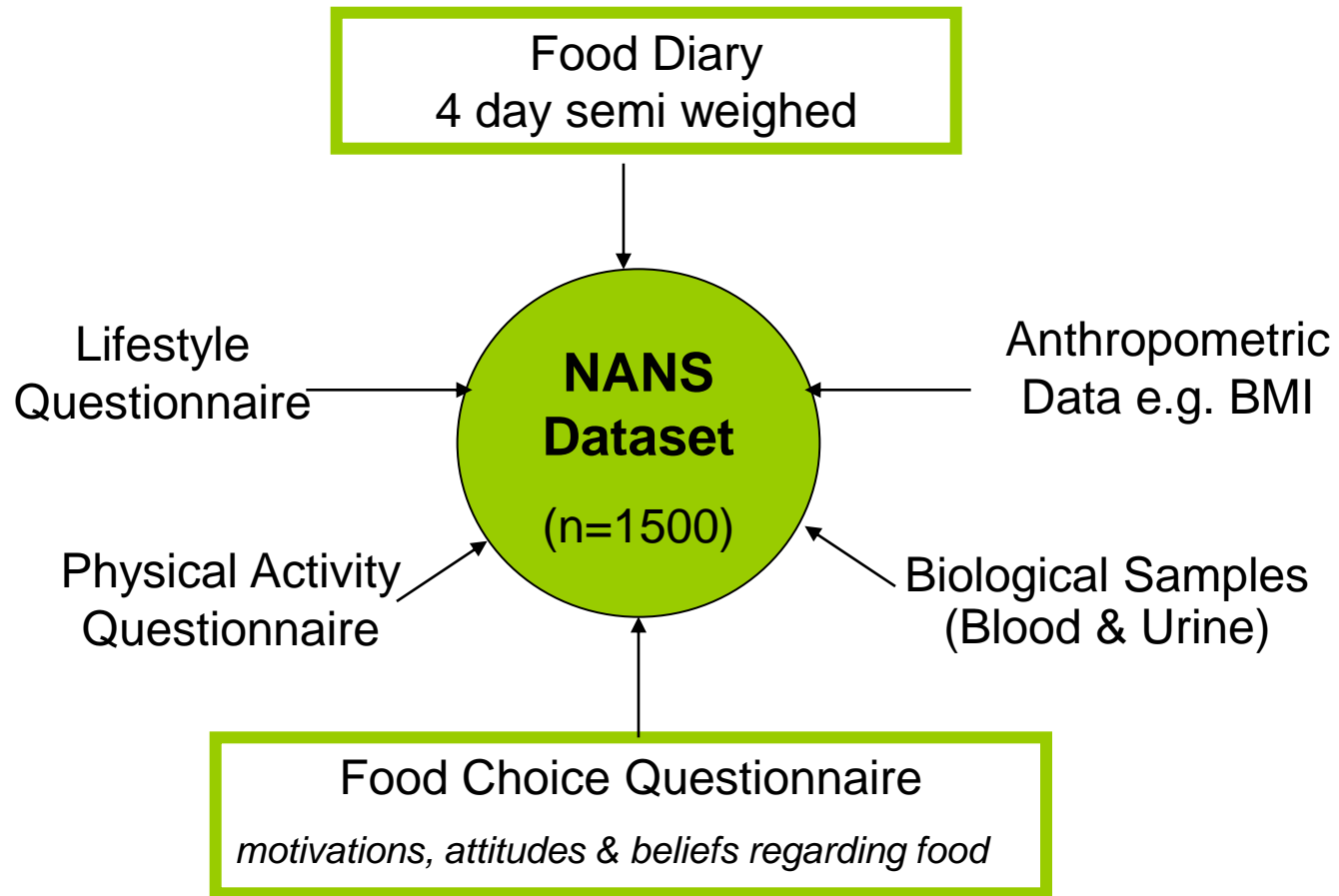
Many proposed models of food choice from simple to complex

# Food Choice Models



Understanding these components & the relationship between them has the potential to result in a better understanding of how people make their food choices & in effect what influences them

# National Adult Nutrition Survey



# Food Choice Questionnaire

Likert scale

Questions derived from previously validated scales

Adapted for Irish setting & context

83 statements



Mood

Health

Convenience

Cost

Sensory

Eating Control

Social influences

Food Decisions

Healthy habit

Resources

Food Involvement

Food Life

Satisfaction

Neophobia

### **Question 1**

We would like you to imagine yourself in an everyday situation making your food selections.

For each of the following statements, please indicate your level of agreement or disagreement,

where (1) is strongly agree and (7) is strongly disagree. Please circle the number that best reflects your view.

<b>It is important to me that the food I eat on a typical day ...</b>	<b>Strongly Agree</b>	<b>Agree</b>	<b>Some-what Agree</b>	<b>Neither Agree nor Disagree</b>	<b>Some-what Disagree</b>	<b>Disagree</b>	<b>Strongly Disagree</b>
is not expensive.	1	2	3	4	5	6	7
contains vitamins and minerals.	1	2	3	4	5	6	7
looks nice.	1	2	3	4	5	6	7
keeps me awake/alert.	1	2	3	4	5	6	7
is good for my appearance (skin/teeth/hair/ nails/etc.).	1	2	3	4	5	6	7
is cheap.	1	2	3	4	5	6	7
helps me to cope with life.	1	2	3	4	5	6	7
is nutritious.	1	2	3	4	5	6	7

# Food Diary

Measures the what, when and where

4 days – balance of week and weekend days

Semi weighed

All information on every food consumed recorded

- Time
- Location
- All constituents in the meal/snack
- Brand
- Packaging
- Recipes
- Leftovers



TODAY'S DATE  <b>12 August</b>	DAY  Mon Tues Wed Thurs Fri Sat Sun (Please circle one)  <b>Tuesday</b>	TIME  <b>1pm</b>	THIS MEAL IS CALLED  <b>LUNCH</b>  _____ (e.g. SNACK, LUNCH, DINNER)	WHERE MEAL/SNACK WAS EATEN  <b>WORK</b>  _____ (e.g. HOME, WORK, RESTAURANT)		WHERE MEAL/SNACK WAS PREPARED  <b>HOME</b>  _____ (e.g. HOME, CANTEEN)	
FOOD OR DRINK (PLEASE DESCRIBE IN DETAIL)		AMOUNT OR WEIGHT (g) OF FOOD	AMOUNT AND DESCRIPTION OF ANY LEFTOVERS (IF ANY)	COOKING METHOD (IF COOKED)	BRAND	FOOD/DRINK PACKAGING	
						TYPE	SIZE
<b>Brown toast</b>		<b>2 slices</b>	<b>None</b>	<b>grilled</b>	<b>Brennans</b>	Wax paper	500g pan
<b>Butter</b>			<b>none</b>		<b>Tesco</b>	Foil	250g
<b>Tea</b>		<b>1 mug</b>	<b>Half mug</b>	<b>boiled</b>	<b>Lyons</b>	Card	600
<b>Milk</b>			<b>Half mug</b>		<b>Avonmore</b>	Card	1ltr
<b>Cheese</b>		<b>3 slices</b>	<b>none</b>		<b>Dublined</b>	Wax paper	200g pack



# Database restructuring & statistical analyses

## Questionnaire

Factor analyses was undertaken to confirm constructs in the food choice questionnaire

Cluster analysis for segmentation

Pearson correlations and regression analysis to predict food consumption

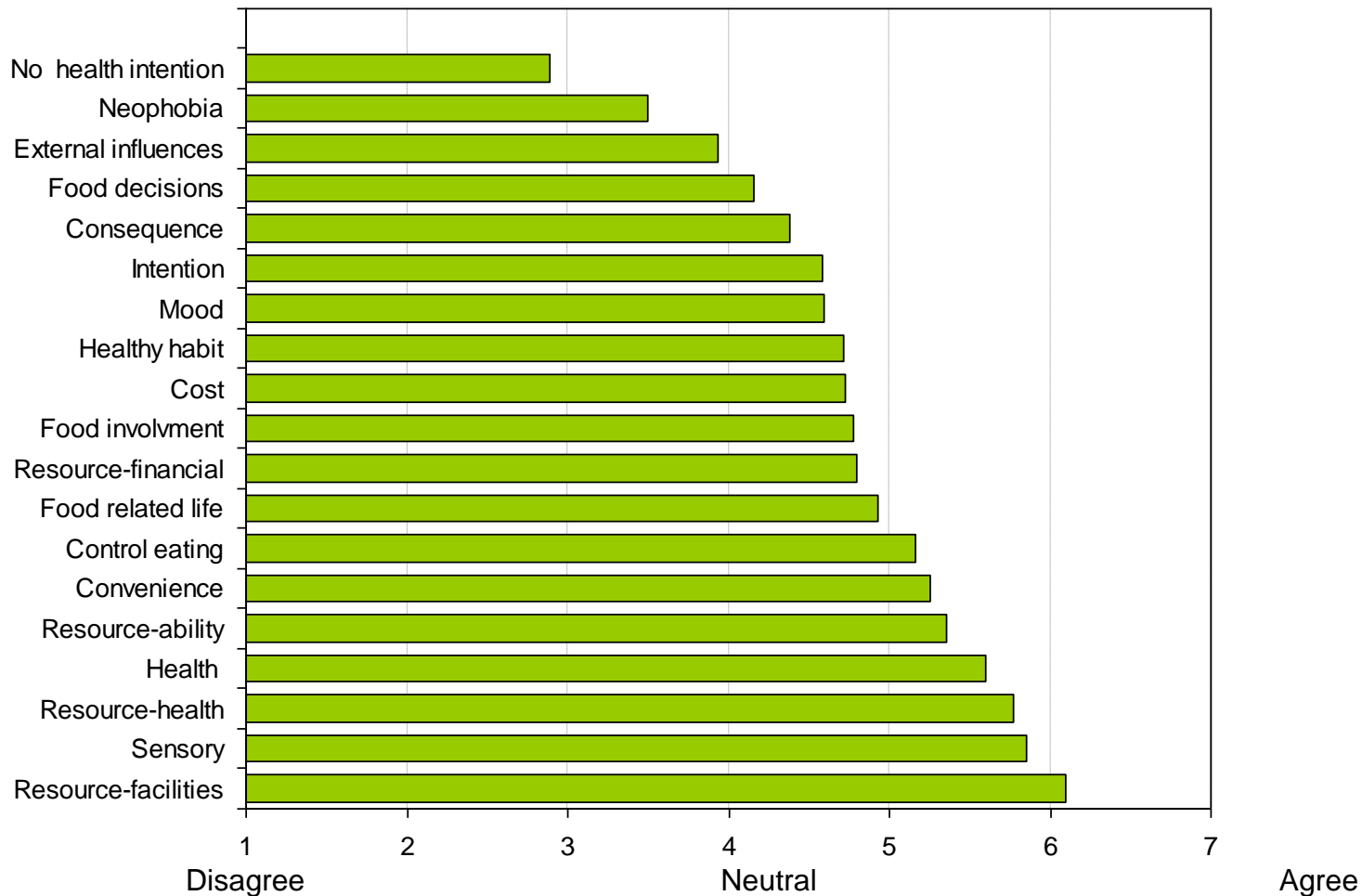
## Food Diary

Converted to mean daily intakes of 19 food groups

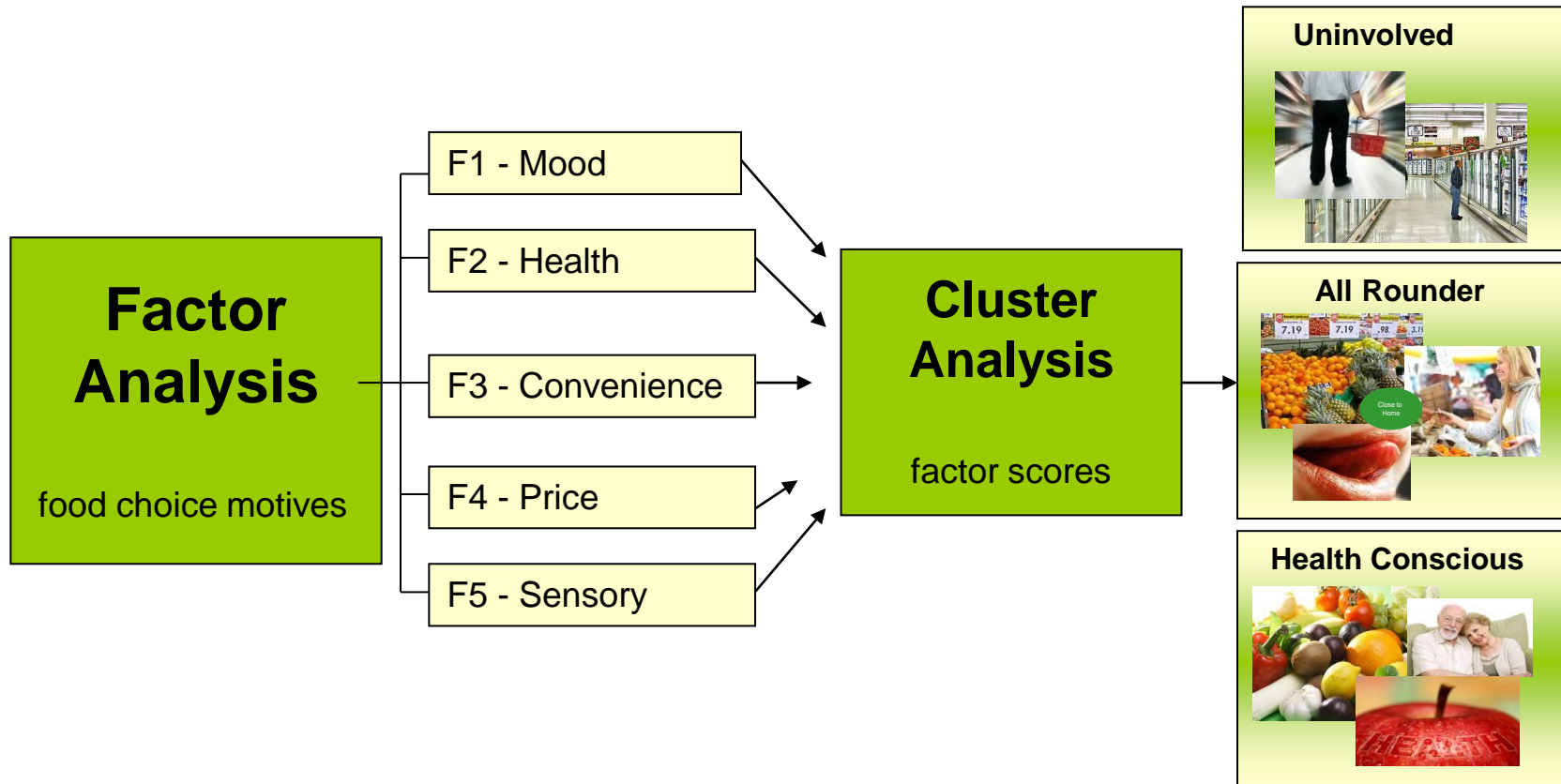
Further aggregated to food pyramid groupings

Consumption variables merged with food choice constructs

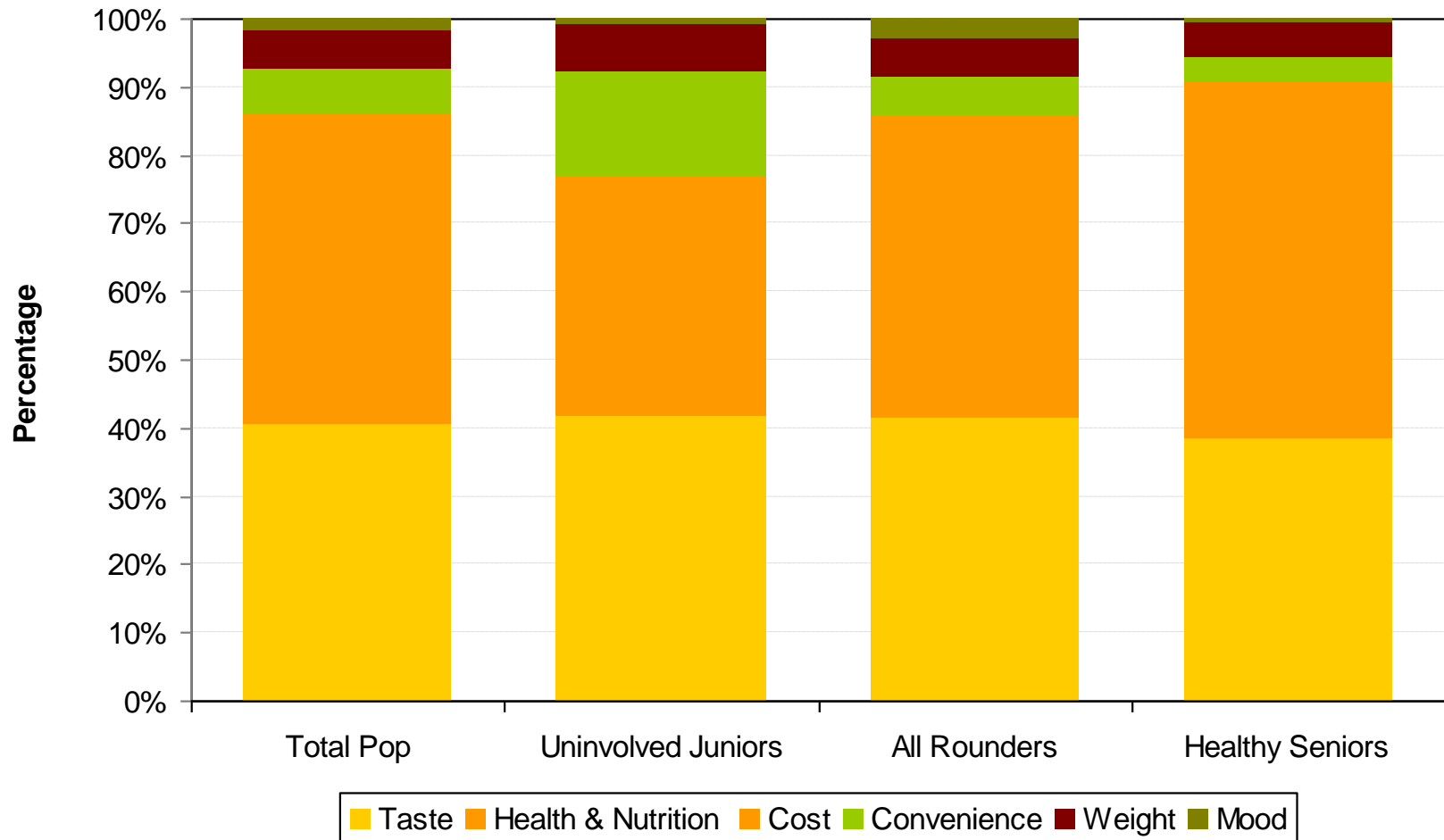
# Mean Scores for Food Choice Constructs



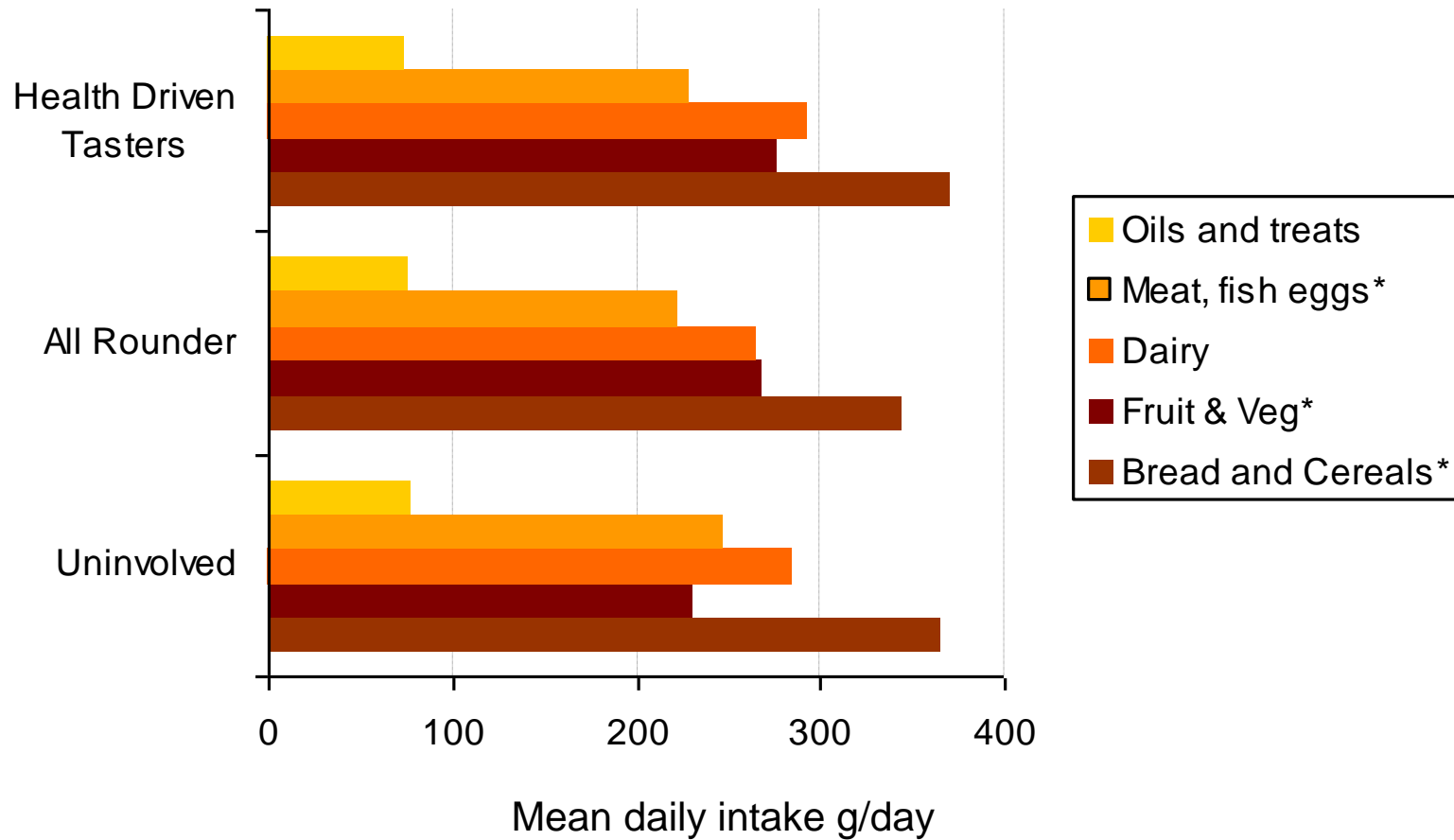
# Segmentation of food choice motives



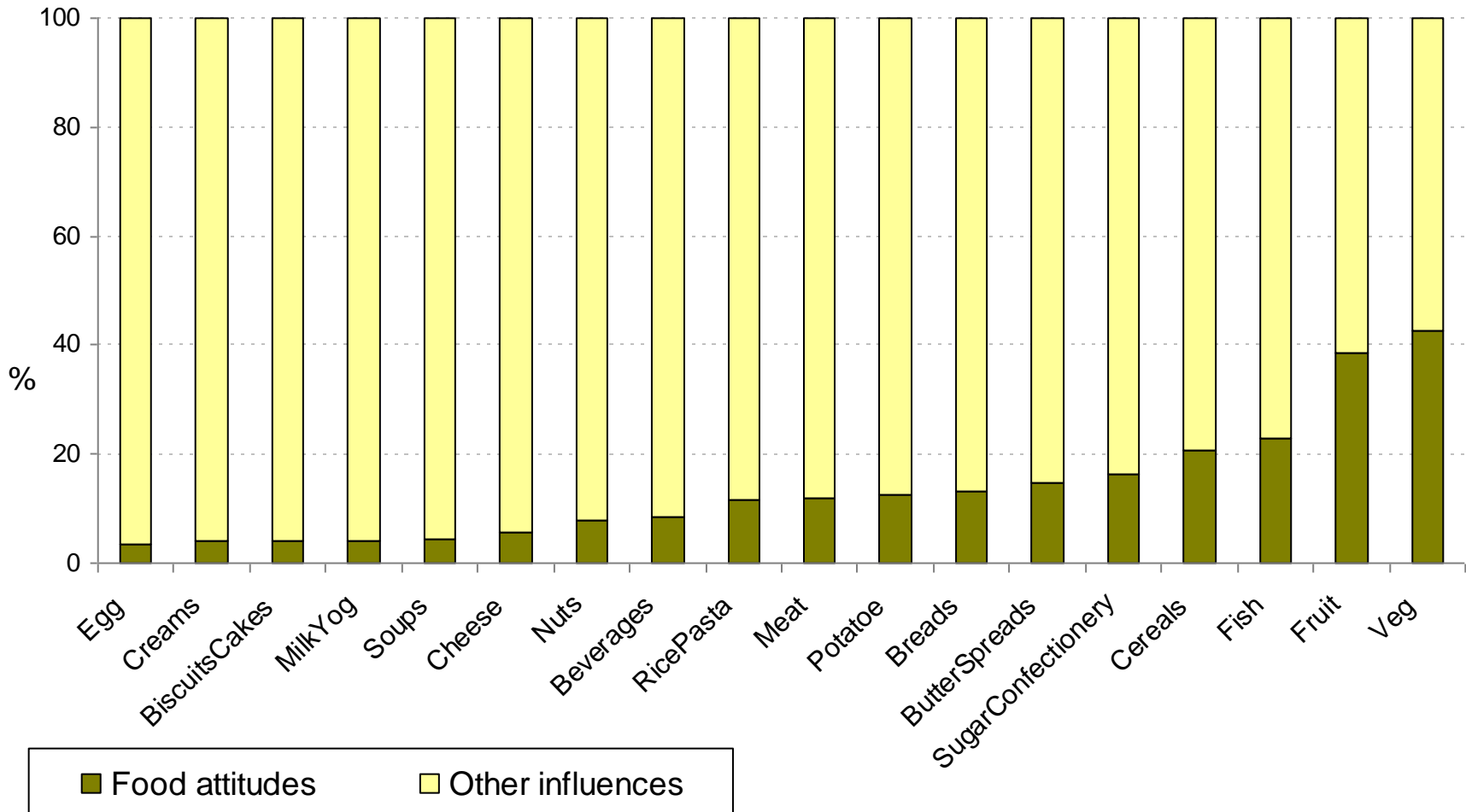
# Food Choice Ranking across Segments



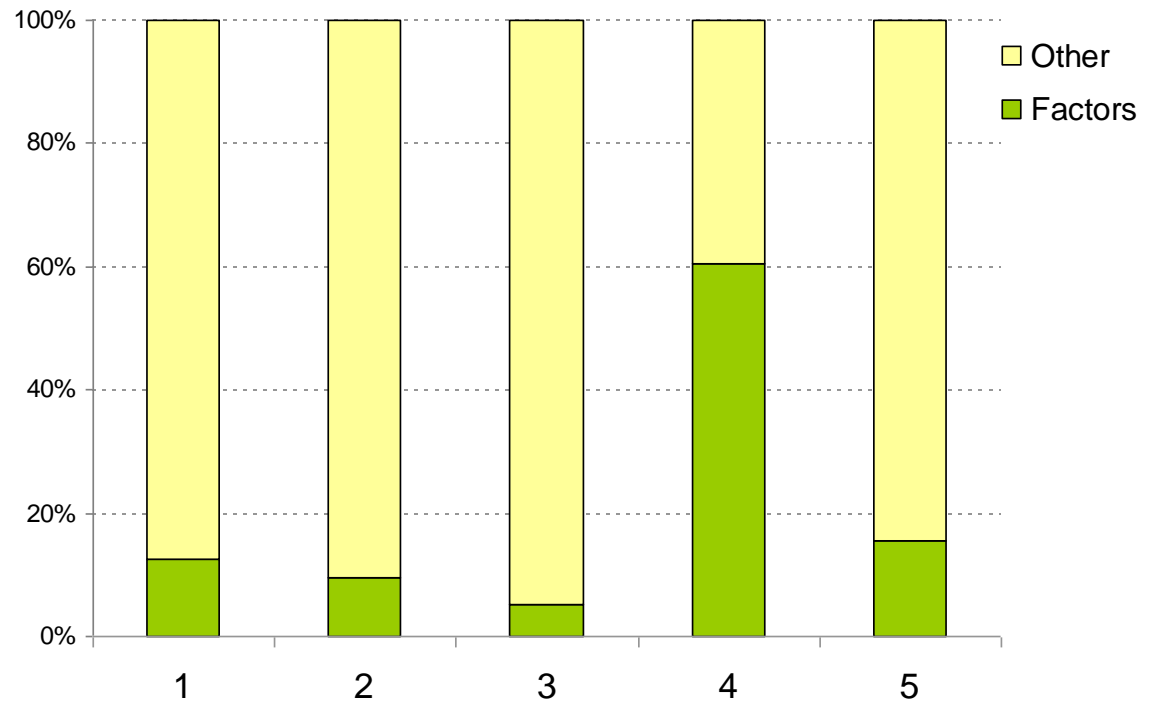
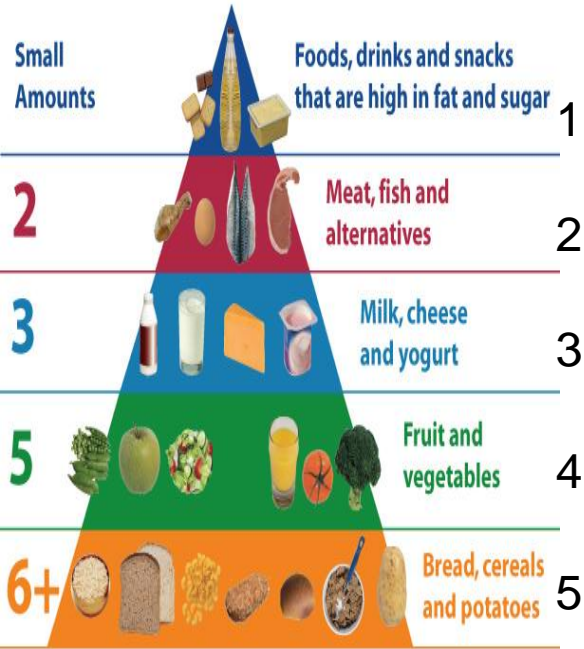
# Segments & Consumption



# Attitudinal Influences on Food Consumption



# Attitudinal influences on food pyramid consumption patterns



Food Pyramid level

# Analyses

**Small  
Amounts**



**Foods, drinks and snacks  
that are high in fat and sugar**

	<b>Standardized Beta</b>	<b>P value</b>
<b>Health</b>	<b>-0.225</b>	<b>0.001</b>
<b>Cost</b>	<b>0.108</b>	<b>0.035</b>
<b>Involvement</b>	<b>0.230</b>	<b>0.001</b>
<b>Neophobia</b>	<b>0.170</b>	<b>0.000</b>



# Analyses

■

2



Meat, fish and  
alternatives

	Standardized Beta	P value
Health	-0.126	0.064
Sensory	-0.144	0.002
Food Life satisfaction	0.162	0.009
Neophobia	-0.135	0.005

# Analyses

3



Milk, cheese  
and yogurt

	Standardized Beta	P value
Sensory	-0.119	0.013
Control Eating	0.153	0.003
Social influences	0.109	0.039

# Analyses

5



Fruit and  
vegetables

	Standardized Beta	P value
Sensory	-0.099	0.025
Social influences	0.089	0.067
Resource facilities	-0.097	0.059
Resource financial	0.100	0.045

# Analyses

6+



Bread, cereals  
and potatoes

	Standardized Beta	P value
Health	-0.138	0.039
Sensory	-0.114	0.013
Resource facilities	-0.126	0.018
Resource health	0.152	0.005
Resource financial	0.108	0.035
Food life satisfaction	0.141	0.021

## Implications & Conclusions

Attitude based segments food consumption behaviour varied

Low fruit and veg in Uninvolved segment

However, no segment complies with fruit and veg recommendation

? Ongoing need for mass communication as well as targeting

Healthy attitudes and motives predict lower consumption of top shelf of food pyramid

Reframing perceptions on eating enjoyment around F&V

Embedded eating pattern – non-conscious level - context important

# ACKNOWLEDGEMENTS

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NANS survey team

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*safefood*

## THANK YOU FOR LISTENING