

IRISH CONSUMER ATTITUDES ON SALT AND FAT PROCESSED MEATS

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Abstract – The following survey reflects how Irish consumers (302 male, 743 female) have responded to the message of healthier food consumption, particularly salt and fat reduction. It appears that educational campaigns have generally been well adopted. From respondents there was a high demand for salt- and fat-reduced products and that they would like to buy more of these kinds of products if available on the market. Younger and lower income respondents pointed to concerns in relation to unit cost prices for such products, but highlighted that if commodity cost prices were reduced, they would purchase more of these reformulated products over conventional equivalents.

Key Words – Consumer survey, Salt- and fat-reduced foods, Traditional foods, Healthy foods, Balanced diet

I. INTRODUCTION

Many food manufacturers are currently reformulating recipes in a bid to reduce fat and salt levels in their products and be seen to mirror what is being endorsed by public health campaigns around the consumption of healthier foods [1,2,3,4]. The following survey presents findings from Irish consumers in relation to how well they have adopted and implemented the message of consuming healthier foods, including reduced salt and fat levels from their diets. The present study was carried out to clarify if a conflict exists between innovation and traditional food manufacture, especially with respect to processed meat manufacture. Furthermore, product development of salt and fat reduced foods involves the use of higher quality ingredients and/or replacers which leads to cost increases. This survey was also carried out to determine what the economic implications were for consumers interested in purchasing products that could be generally termed as 'healthier food products'.

II. MATERIALS AND METHODS

In September 2014, 1045 consumers took part on the online survey titled "Salt- and fat-reduced foods". The survey was distributed to a broad range of individuals living on the island of Ireland; the specific demographics of which are explained in great detail later in this paper. The survey was conducted in English and was constructed to take approximately 10 minutes to complete. To attain maximum participation in the survey, a total of 16 questions were constructed. The questionnaire was divided into four sections. The first section pertained to consumer socio-demographic details while the second section set about ascertaining financial details from consumers. The third section of the survey dealt with food consumption patterns, with a particular focus on reduced salt and fat food consumption and the final section of the survey explored the inherent knowledge and beliefs held by consumers.

III. RESULTS AND DISCUSSION

In total, 43% of participants purchased salt-reduced foods and almost two-thirds of participants purchased fat-reduced foods (Table 3). Without exception, more fat-reduced than salt-reduced foods were purchased, independent of age, gender and level of education. Adults aged under 20 were the group least interested (at 29%) in the purchase of salt-reduced foods. Significantly more women purchased salt- (48%) and fat-reduced (70%) foods than men (32% and 50%, respectively). 56% of participants would purchase salt- and fat-reduced foods, even when products were more expensive to purchase.

IV. CONCLUSION

More than half of the participants carefully maintained a balanced diet. Furthermore, an increase in purchasing salt-reduced food was observed, although fat-reduced food products were already better accepted. In general, men, young adults (<30 years) and those with a less well-educated background purchased less salt- and fat-reduced foods and also took less care in maintaining a balanced diet. The purchase of traditional food products with reduced salt and fat content were unaffected as long as the intrinsic sensory character was maintained for each product. There was a high demand for salt- and fat-reduced products and that they would like to buy more of these kinds of products if available on the market. Younger and lower income respondents pointed to concerns in relation to unit cost prices for such products.

Table 1

Consumption characteristics of participants (n = 1045), questions and frequency of answers as percentage

Questionnaire n = 1045	Total %	Age %						Gender %	
		< 20	20-29	30-39	40-49	50-59	≥ 60	female	male
Do you purchase salt-reduced food?									
Yes	43,3	29.3 ^a	43.5 ^b	46.7 ^b	50.3 ^b	49.5 ^b	53.1 ^b	48.2 ^a	31.5 ^b
No	56,7	70.7 ^a	56.5 ^b	53.3 ^b	49.7 ^b	50.5 ^b	46.9 ^b	51.8 ^a	68.5 ^b
Do you purchase fat-reduced food?									
Yes	64,3	52.7 ^a	62.3 ^a	67.8 ^{ab}	67.2 ^{ab}	78.5 ^b	75.5 ^{ab}	70.3 ^a	49.7 ^b
No	35,7	47.3 ^a	37.7 ^a	32.2 ^{ab}	32.7 ^{ab}	21.5 ^b	24.5 ^{ab}	29.7 ^a	50.3 ^b
Would you purchase salt- and fat-reduced food even when the product is more expensive?									
Yes	56,0	41.5 ^a	47.9 ^a	66.4 ^b	63.7 ^b	71.0 ^b	83.7 ^b	59.0 ^a	48.7 ^b
No	44,0	58.5 ^a	52.1 ^a	33.6 ^b	36.3 ^b	29.0 ^b	16.3 ^b	41.0 ^a	51.3 ^b

^{a,b,c} Percentages within question and row sharing different letters are significantly different.**Table 2**

Knowledge and beliefs of participants (n = 1045), questions and frequency of answers as percentage

Questionnaire n = 1045	Total %	Age %							Gender %	
		< 20	20-29	30-39	40-49	50-59	≥ 60	female	male	
Do you know that high sodium levels in food can cause hypertension, cardiovascular diseases and stroke?										
Yes	92,1	88.8 ^a	91.4 ^a	92.8 ^a	94.7 ^a	96.3 ^a	89.8 ^a	93.9 ^a	87.4 ^b	
No	7,9	11.2 ^a	8.6 ^a	7.2 ^a	5.3 ^a	3.7 ^a	10.2 ^a	6.1 ^a	12.6 ^b	
Do you know that high saturated fatty acids level in food can cause obesity, diabetes and stroke?										
Yes	97,3	98.0 ^a	96.4 ^a	97.4 ^a	98.8 ^a	99.1 ^a	91.8 ^a	98.1 ^a	95.4 ^a	
No	2,7	2.0 ^a	3.6 ^a	2.6 ^a	1.2 ^a	0.9 ^a	8.2 ^a	1.9 ^a	4.6 ^a	
Do you think there is a greater need in informing people about the impact of sodium and saturated fatty acids in food on body health?										
Yes	87,4	85.9 ^a	86.1 ^a	86.8 ^a	87.1 ^a	93.5 ^a	91.8 ^a	89.8 ^a	81.5 ^b	
No	12,6	14.1 ^a	13.9 ^a	13.2 ^a	12.9 ^a	6.5 ^a	8.2 ^a	10.2 ^a	18.5 ^b	
Do you think there is a greater need for salt and fat reduced products on the market?										
Yes	82,7	82.4 ^a	80.3 ^a	85.5 ^a	82.5 ^a	84.1 ^a	89.8 ^a	84.4 ^a	78.5 ^a	
No	17,3	17.6 ^a	19.7 ^a	14.5 ^a	17.5 ^a	15.9 ^a	10.2 ^a	15.6 ^a	21.5 ^a	

^{a,b,c} Percentages within question and row sharing different letters are significantly different.

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