
PS.C58**Effect of Long-Term Almond Supplementation on Food Intake and Eating Patterns***K. Jaceldo-Siegl, J. Sabaté*Department of Nutrition, School of Public Health,
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Adding a new food to a habitual diet (HD) may alter eating patterns and intake of other foods. The impact on food intake and eating patterns of supplementing a self-selected diet (with little or no nuts) with almonds was examined in a 12-month study. The first 6 months constituted the control period where subjects followed their HD. During the intervention (second 6 months), subjects were asked to incorporate almonds (~52 g) into their HD without dietary advice by free feeding daily on the nuts (AD). 81 healthy males and females age 25–70 years completed the study. Subjects incorporated almonds into their HD by eating the nuts as a single portion. Regression results showed that age, sex, BMI, and displacement of grains, dairy products, fats, sweets, and vegetables in the overall diet were associated significantly with change in energy from almonds, $F(5, 75) = 3.15$, $p < 0.01$. Reduction in breakfast skipping was significant among males ($p < 0.05$) but not in females. The proportion of frequent and infrequent snackers in females according to BMI did not differ. By contrast, in lean males, 35% were frequent snackers, and 65% were infrequent snackers; in obese males (BMI > 84th percentile), 88% were frequent snackers, and 12% were infrequent snackers (Chi square = 6.4, $p < 0.05$). The observed changes in eating patterns, displacement of other foods in the overall diet, and prevention of breakfast skipping among males during almond supplementation may have contributed to improved energy intake regulation in this population.

PS.C59**Food Consumption in Russia: Geographical and Socio-Economic Differences***A.K. Baturin¹, B.M. Popkin²*¹Institute of Nutrition, Moscow, Russia,²Nutrition Department, University of North Carolina at Chapel Hill, N.C., USA

Longitudinal research on over 11,000 Russians from 38 regions are used to examine territorial and related eating patterns. The data come from the nationally representative Russian Longitudinal Monitoring Survey (RLMS). Standardized twenty-four recalls along with food expenditures and anthropometric measurements are collected from all households and individuals in them. Additional in-depth socio-economic and demographic data are collected.

Large regional differences in food consumption patterns exist. The structure of consumption also differs within these groups. For example, the average wheat and rye bread consumption is 174 g per day with about 35% from rye bread. In the Northern Caucasus the bread consumption level is one of the highest in the country – more than 200 g, but the rye bread is not consumed. Large economic

differences exist in bread consumption, patterns not inversely linked to income as one might expect.

Nutrient differences are also studied. For example, vitamin C consumption levels are lowest (40–50 mg/day) in the Northern European part of Russia, in the Urals and the Far East. At the same time the major source of Vitamin C was potatoes. The average level of consumption of fruit and vegetables did not exceed 300 g/day and to a great extent depended on the income.

The geographical differences in overweight and obesity prevalence, depending on family income, are also examined.

PS.C60**Consumers' Acceptance and Preference Towards New Generation Drinks***J. Kutermankiewicz*Faculty of Human Nutrition and Consumer Sciences,
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The consumer is the key element which reshapes modern food marketing and markets. This can be observed in the beverage market, where the most successful products appeal strongly to particular consumers groups. Energy drinks, which respond to specific needs and desires, are a perfect example of new drink product.

The aim of this study was to investigate consumers' acceptance and preference towards energy drinks, what can help in understanding consumer's choices and latest trends which appear in the beverages market.

The study was carried out in 2002 in Warsaw (Poland). The target population consisted of 162 people, selected on 3 factors: age, gender and consumption of energy drinks. The respondents evaluate seven beverages on taste, flavour and overall acceptability. After sensory sessions, they filled in the U and A questionnaire, which consist of two parts. The first part includes questions relating to energy drink purchasing and consumption, second – statements concerning product image, consumers' values and lifestyles. Statistical analysis was performed using Statistical Package for the Social Sciences and Sensory Analysis and Consumer Test Management Software.

Results from marketing U and A test were undertaken using factor analysis followed by cluster analysis. From that three respondents' clusters were elicited. Later data analysis was focused on checking if consumer's life style will influence on product's evaluation and choice. For each cluster, the analysis of products attribute scores was conducted (two-way ANOVA).

The final results have proved that beside pleasant taste of drink, consumers are demanding products that fit in with their individual styles and habits. Consumers can (to some extent) tolerate a lack of appeal on some sensory attributes in exchange for functionality. However functionality is no compensation for poor sensory quality.