O18 (continued)

Outcome Measures and Analysis: Eating behaviors measured with Three Factor Eating Questionnaire (TFEQ), Satter Eating Competence Inventory (ecSI 2.0); BMI, waist circumference (WC), DRD2/ANKK1 allelic expression. Analyses included General Linear Modeling controlling for covariates.

Results: Of 65 (mean age 40.6 ± 5.2 y; BMI 31.2 ± 4.4) providing DRD2/ANKK1 data, 60 completed ecSI 2.0 and/or TFEQ; 14% were eating competent (EC), mean ecSI 2.0 score was 26.1 ± 6.1. ecSI 2.0 was not associated with BMI or WC, but significantly inversely correlated with TFEQ cognitive restraint (CR), emotional eating (EE), and uncontrolled eating (all P < 0.05). ANKK1/DRD2 allele distribution was AA-1, AG-25, and GG-39. When controlled for TFEQ-EE, ecSI 2.0 was higher (P = 0.035) in GG (27.4 ± 177; 0.9) than AG (24.1 ± 177; 1.3). ecSI 2.0 Food Acceptance subscale, which was significantly greater in GG without any controls (P = 0.009) remained significant when controlling for TFEQ-EE (P = 0.008). ecSI 2.0 contextual skills tended to be greater in GG (P = 0.06), continuing so when controlling for TFEQ-EE (P = 0.07) and significant when controlling for TFEQ-CR (P = 0.047).

Conclusions and Implications: EC was related to ANKK1/DRD2 polymorphisms; ecSI 2.0 scores were lower for heterozygotes carrying the A1 allele associated with cognitive behaviors interfering with healthful eating. These findings provide support for the design of genetically personalized EC education and suggest further research into the role of dopamine in EC.

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O19 Beyond Health: Extending Teaching About Sustainability of the Mediterranean Diet in Malta
Suzeanne Piscopo, PhD, susanne.piscopo@um.edu.mt, R. Nutritionist, R. Eur Health Prom Practitioner, University of Malta, Room 324, Faculty of Education, University of Malta, Tal-Qroqq, Msida Malta MSD2080

Objective: To assess whether educational reforms in Malta are promoting a holistic valuation of the Mediterranean Diet (MD).

Target Audience: University and Secondary students.

Theory, Prior Research, Rationale: Recently, there were developments in the Maltese national Secondary level curriculum and in the undergraduate Home Economics (HE) training at the University of Malta. Simultaneously, promotion of the value of the MD has expanded and increased by national health authorities and by international experts.

Description of Course and Curriculum: The BSc HE program and the learning outcomes of various Secondary school subjects were analysed to identify the extent to which they promoted the four dimensions of a recently proposed framework on sustainability of the MD.

Evaluation: Results indicate that the health and nutrition benefits of the MD are tackled most, though to varying levels, in both the degree program and different school subjects. The HE degree also addresses the other three dimensions – namely richness in biodiversity and low environmental impact, high socio-cultural food value, and positive local economic returns – though in less detail. The Core Science Secondary school subject has good potential for including the biodiversity and environmental impact dimension; whereas Personal, Social and Career Development and Social Studies have good potential for incorporating the socio-cultural and economic dimensions. There is some coverage of the latter dimensions in HE; yet potential for integration is much higher.

Conclusions and Implications: In Maltese Secondary and Tertiary education there is moderate coverage of the health benefits of the MD. Attention is required to expand students’ appreciation of the other sustainability dimensions of this diet to help strengthen adherence to it for individual and community wellbeing.

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O20 Cultivating Healthful Eating in Families (CHEF): A Family-Based Program Targeting Whole Plant Foods
Tonja Nansel, PhD, nanselt@mail.nih.gov, Eunice Kennedy Shriver National Institute of Child Health and Human Development, 6710B Rockledge Drive, Bethesda, MD 20817-7004; Leah Lipsky, PhD, Eunice Kennedy Shriver National Institute of Child Health and Human Development

Objective: To create a family-based program for improving diet quality.

Target Audience: This program is applicable to families seeking to improve dietary quality in a clinic-based setting, and could be used by nutrition researchers, extension workers, and practitioners conducting behavioral nutrition interventions and programs.

Theory, Prior Research, Rationale: The approach was guided by self-regulation, social cognitive, and self-determination theories. An applied problem-solving structure, which has demonstrated efficacy in improving various health behaviors, was adapted for application to eating behaviors.

Description: The curriculum comprises six core and three booster sessions, and can be delivered by non-professionals or professionals. Sessions integrate a motivational interviewing style of interaction to increase internal motivation for healthful eating, active learning to facilitate skill-building and engagement with the educational information, and applied problem-solving to facilitate goal-directed behavior and self-regulation skills. An initial overview session addresses key principles of healthy eating, focusing on whole plant foods (fruits, vegetables, whole grains, legumes, nuts, seeds). The next five sessions apply these principles to specific eating contexts - breakfast, lunch, dinner, snacks, and eating away-from-home. Three booster sessions address overcoming challenges associated

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