

Poster Session I: Thursday, May 30, 2019

- Board 25: 25-HYDROXYVITAMIN D CAN BE MEASURED IN HUMAN HAIR. L Zgaga¹, E Laird¹, M Healy².
¹School of Medicine, Trinity College Dublin, Ireland; ²Department of Biochemistry, St James's Hospital, Dublin, Ireland
- Board 26: BIOTIN SUPPLEMENTATION CAUSES ERRONEOUS ELEVATIONS OF RESULTS IN SOME COMMERCIAL SERUM 25-HYDROXYVITAMIN D (25-OH-D) ASSAYS. GD Carter, F Ahmed, J Berry, E Cavalier, R Durazo-Arvizu, E Gunter, G Jones, J Jones, K Phinney, CT Sempos, PJ Twomey, EL Williams. DEQAS, Charing Cross Hospital, London W6 8RF, UK
- Board 27: DIETARY PHOSPHORUS RESTRICTION INTERFERES WITH THE REGULATION OF VITAMIN D METABOLISM. A.S. Muscher-Banse¹, W. Grünberg², A. Rajaeerad³, N. Schnepel¹, A. Kauke¹, K. Hansen¹, MR. Wilkens¹. ¹Institute of Physiology and Cell Biology and ²Clinic for Cattle, University of Veterinary Medicine Hannover, Germany; ³Department of Animal Sciences, College of Agriculture, Isfahan University of Technology, Iran
- Board 28: EFFECTS OF CALCIFEDIOL COMPARED TO CHOLECALCIFEROL ON VITAMIN D SERUM LEVEL IN WOMEN AFFECTED BY OSTEOPOROSIS. V Vinicola, M Di Bonito, V Ferretti, E Giampà, P Gigliotti, G Nuvoli, F Paoletti, M Piazzini, M Ranieri, MA Tuveri. I.R.C.C.S. Fondazione Santa Lucia, Rome, Italy
- Board 29: VITAMIN D AND IMMUNE CHECKPOINT BLOCKADE IN HEAD AND NECK CANCER A Verma, VK Vincent-Chong, PA Hershberger, M Seshadri. Roswell Park Comprehensive Cancer Center, Buffalo, NY 14263
- Board 30: OSTEOLAST-SPECIFIC DELETION OF NEUROFILIN 2 RESULTS IN CORTICAL BONE LOSS. L Verlinden, I Janssens, G Carmeliet, A Verstuyf. Clinical and Experimental Endocrinology, KU Leuven, Belgium
- Board 31: THE BONE PHENOTYPE OF THE KLOTHO MUTANT MOUSE DOES NOT REFLECT CHANGES IN SKELETAL ARCHITECTURE THAT OCCUR WITH AGING. V. Verlinden¹, V. Veldurthy², S. Li², G. Carmeliet¹ and S. Christakos². KU Leuven, Leuven, Belgium¹, Rutgers, New Jersey Medical School, Newark, NJ²
- Board 32: INECALCITOL COMBINED WITH PALBOCICLIB REDUCES CELLULAR GROWTH IN ESTROGEN RECEPTOR-POSITIVE AND TRIPLE-NEGATIVE BREAST CANCER. J. Vanhevel¹, S. Bevers¹, L. Verlinden¹, J. Ryyänen¹, R. Delansorne², M.J. Duffy³, H. Wildiers⁴, A. Verstuyf¹.
¹Laboratory of Clinical and Experimental Endocrinology, KU Leuven, Leuven, Belgium; ²Hybrigenics SA, Paris, France; ³University College Dublin, Dublin, Ireland; ⁴Laboratory of Experimental Oncology, KU Leuven, Leuven, Belgium
- Board 33: SYNTHESIS OF 2-(2-TRIAZOLYLETHYL)-1 α ,25-DIHYDROXY-19-NORVITAMIN D₃ AND ITS METABOLISM. M Takano¹, K Yasuda², H Mano², T Sakaki², and A Kittaka^{1*} ¹Faculty of Pharmaceutical Sciences, Teikyo University, Tokyo, Japan; ²Faculty of Engineering, Toyama Prefectural University, Toyama, Japan
- Board 34: DEFINING THE CLINICAL UTILITY OF VITAMIN D IN THE PREVENTION AND TREATMENT OF ORAL CANCER. VK Vincent-Chong, A Verma, H DeJong, K Bothwell, PA Hershberger, Johnson CS, M Seshadri. Roswell Park Comprehensive Cancer Center, Buffalo, NY
- Board 35: GESTATIONAL HYPERCALCEMIA: PREVALENCE AND BIOCHEMICAL PROFILE. I. Schoenmakers¹, S. Baban¹, L. Barebring², I. Piec¹, D. Green¹, C. Washbourne¹, J. Tang¹, W.D. Fraser¹, H. Augustin². ¹University of East Anglia (UEA), UK and ²University of Gothenburg (UGOT), Sweden
- Board 36: THE VITAMIN D SYSTEM IN OVARIAN CANCER CELLS. M. Schepelmann¹, I. Klee¹, D. Cacsire Castillo-Tong², I. von der Decken², C. Kreuzinger², A. Wolf², E. Kallay¹. ¹Inst. Pathophysiol. and Allergy Res., ²Translational Gynecology Group, Dept. Obstetrics and Gynecology, Comprehensive Cancer Center, Medical University of Vienna, Austria

- Board 37: CORRECTION OF VITAMIN D DEFICIENCY IN POSTMENOPAUSAL WOMEN. VV Povoroznyuk, NI Dzerovych, AS Musiienko, TYu Solonenko, OS Ivanyk. D. F. Chebotarev Institute of Gerontology NAMS Ukraine, Ukrainian Scientific-Medical Centre for the Problems of Osteoporosis, Kyiv, Ukraine
- Board 38: CONJUNCTIVAL ABSORPTION OF VITAMIN D3. RGC Leca, RV Temi, C Scorza, F Scorza, AAS Lima, F Fonseca. Faculdade de Medicina do ABC, Brazil
- Board 39: EVALUATION OF THE VITAMIN D3 LEVELS IN TEAR AND BLOOD OF STUDENTS DURING EXERCISE. RGC Leca, RV Tiemi, D Freitas, ALH Lima, C Scorza, FA Scorza, FLA Fonseca. Faculdade de Medicina do ABC, BRAZIL
- Board 40: VITAMIN D AND SLEEP IN THE TROMSØ STUDY: RESULTS FROM A POPULATION-BASED HEALTH SURVEY. A. U. Larsen¹, L. A. Hopstock², G. Grimnes¹, R. Jorde¹. Tromsø Endocrine Research Group, Department of Clinical Medicine¹. Department of Community Medicine². UiT - The Arctic University of Norway
- Board 41: DIET-INDUCED VITAMIN D INSUFFICIENCY ALTERS IMMUNE CELL COMPOSITION OF BALB/C MICE. C. Matos¹, M. Kreutz¹, K. Peter¹. ¹Department of Internal Medicine III, University Hospital Regensburg, Germany
- Board 42: IN SILICO ANALYSIS OF 1- α -HYDROXYLASE IN PROSTATE CANCER. R Martinelli, L Esteban. Department of Biological Chemistry, School of Medicine, National University of Rosario, Santa Fe
- Board 43: EXTRA-RENAL CYP27B1 ACTIVITY AND HYPERCALCEMIA AFTER COSMETIC PARAFFIN OIL INJECTIONS: AETIOLOGY, PATHOGENESIS AND TREATMENT. E Eldrup¹, S Theilade¹, M Lorenzen², KH Poulsen², A Jørgensen², M Blomberg Jensen^{1,2}. ¹ Department of Endocrinology, Herlev-Hospital, Denmark; ² Group of Skeletal, Mineral and Gonadal Endocrinology, Department of Growth and Reproduction, Rigshospitalet, Denmark
- Board 44: INTERLABORATORY COMPARISON STUDY: FUTURE DIAGNOSTICS' KIT FOR THE DIRECT MEASUREMENT OF FREE 25-HYDROXYVITAMIN D. Free 25(OH)D Working Group (F25D-WG). Gaithersburg, MD
- Board 45: EVALUATION OF THE REPRODUCIBILITY OF AN ELISA KIT FOR THE DIRECT MEASUREMENT OF FREE 25-HYDROXYVITAMIN D. Ernst Lindhout¹, Nicolas Heurreux², Mike Martens¹. ¹Future Diagnostics Solutions, Wijchen, The Netherlands, ²DIAsource Immunoassays, Louvain-La-Neuve, Belgium
- Board 46: INTRODUCTION OF FLUORINE ATOMS ON VITAMINE D₃ SIDE-CHAIN AT C24 POSITION. E Kawagoe^{1,2}, S Mototani¹, K Yasuda³, K Nagasawa^{2,4}, M Uesugi^{2,5}, T Sakaki³, A Kittaka^{1,2}. ¹Faculty of Pharmaceutical Sciences, Teikyo University, Tokyo, Japan; ²AMED-CREST, AMED; ³Faculty of Engineering, Toyama Prefectural University, Toyama, Japan; ⁴Department of Biotechnology and Life Science, Tokyo University of Agriculture and Technology, Tokyo, Japan; ⁵Institute for Chemical Research, Kyoto University, Kyoto, Japan
- Board 47: DETECTION OF 20-HYDROXY-7-DEHYDROCHOLESTEROL AND 20-HYDROXYVITAMIN D3 IN HONEY. TK Kim^{1,2}, RC Tuckey³, AT Slominski^{1,2}. ¹Department of Dermatology, The University of Alabama at Birmingham, ²VA Medical Center, Birmingham, AL 35294, ³School of Molecular Sciences, The University of Western Australia, Perth, WA 6009, Australia
- Board 48: AN EFFICIENT SYNTHESIS OF 11 α ,25-DIHYDROXYVITAMIN D₃ (C3-TBDMS-ETHER). Lars Kattner and Erik Rauch, Endotherm Life Science Molecules, Science Park 2, Saarbruecken, Germany 66123
- Board 49: CHARACTERIZATION OF HUMAN CYP24A1-ADRENODOXIN FUSION IN THE DEACTIVATION OF VITAMIN-D. N Jay, DF Estrada, University at Buffalo, SUNY

- Board 50: SAFETY OF INTRA-ARTICULAR VITAMIN D ANALOGUE CALCIPOTRIOL IN ZYMO-SAN-INDUCED RAT ARTHRITIS MODEL. JA Huhtakangas¹, J Huovinen¹, S Laaksonen², H-M Voipio², J Thevenot³, P Lehenkari¹. Cancer Research and Translational Medicine Research Unit¹, Laboratory Animal Centre², Research Unit of Medical Imaging, Physics and Technology³; University of Oulu, Oulu, Finland
- Board 51: CONCISE SYNTHESIS AND BIOLOGICAL EVALUATION OF NOVEL VITAMIN D ANALOGUES BEARING A FUNCTIONALIZED AROMATIC RING ON THE SIDE CHAIN. T. Fujishima, T. Komatsu, Y. Takao, W. Yonamine, T. Suenega, H. Isono, M. Morikawa, K. Takaguchi. Faculty of Pharmaceutical Sciences at Kagawa Campus, Tokushima Bunri University, Sanuki-city, Kagawa 769-2193, Japan
- Board 52: INTESTINAL RESPONSES TO 1,25 DIHYDROXYVITAMIN D ARE NOT IMPROVED BY HIGHER INTESTINAL VDR LEVELS RESULTING FROM TRANSGENIC EXPRESSION OF VDR IN THE WHOLE INTESTINE OR DISTAL INTESTINE. JC Fleet, P Reyes-Fernandez, J Hur, S Christakos. Dept. Nutrition Science, Purdue University, NY, New Jersey Medical School, Rutgers University, NJ
- Board 53: SYNTHESIS OF C-2 MODIFIED 19-NORCALCITRIOL ANALOGS AS A NEW TOOL FOR PLATINUM DRUGS DEVELOPMENT AND POTENTIAL ANTICANCER APPLICATIONS. A. Fabisiak, P. Brzeminski, R.R. Sicinski, Department of Chemistry, University of Warsaw, Poland
- Board 54: A STRUCTURAL BASIS FOR THE METABOLIC STABILITY OF SIDE-CHAIN MODIFIED VITAMIN D ANALOGS. D.F. Estrada, N. Jay, A. Kumar. Department of Biochemistry, Jacobs School of Medicine, University at Buffalo, Buffalo, NY 14023
- Board 55: CLINICALLY RELEVANT FUMARIC ACID ESTERS DIFFERENTIALLY AFFECT THE ANTILEUKEMIC EFFECTS OF VITAMIN D DERIVATIVES ON AML CELLS UNDER NON-CYTOTOXIC AND CYTOTOXIC THERAPEUTIC CONDITIONS. H Nujedat¹, A Dawod¹, A Trachtenberg¹, A Kutner², GP Studzinski³ and M Danilenko¹ ¹ Department of Clinical Biochemistry & Pharmacology, Ben-Gurion University of the Negev (Beer Sheva, Israel); ² Department of Pharmacology, Pharmaceutical Research Institute (Warsaw, Poland); ³ Department of Pathology & Laboratory Medicine, NJ Medical School, Rutgers, Newark, NJ, USA.
- Board 56: VITAMIN D 1 α -HYDROXYLASE PURIFIED RECOMBINANTLY AS CYP27B1-ADRENODOXIN FUSION. C. S. Campomizzi, D. F. Estrada The Department of Biochemistry, Jacobs School of Medicine and Biomedical Sciences, SUNY Buffalo, NY
- Board 57: KEEPING THE JUICE INSIDE - VITAMIN D-METABOLITES AND CHICKEN BREAST MEAT RIPENING. K. Buehler¹, H. Bachmann¹, Kh. Saikhla². ¹Herbonis Animal Health GmbH, Augst, Switzerland; ²Bangkok Animal Research Center Co. Ltd., Bangkok, Thailand.
- Board 58: SYNTHESIS AND BIOLOGICAL EVALUATION OF NEW 2-METHYLENE-19-NORCALCITRIOL ANALOGS WITH SIDE CHAIN MODIFICATIONS. P Brzeminski, A Fabisiak, RR Sicinski. Department of Chemistry, University of Warsaw, Pasteura 1, 02-093 Warsaw, Poland
- Board 59: VITAMIN D REGULATES PROSTATE CELL METABOLISM VIA CLASSICAL GENOMIC MECHANISMS AND BY NON-GENOMIC ACTIONS THROUGH LOCAL REDOX-DEPENDENT METABOLISM WITHIN THE MITOCHONDRIA. C Blajszczak, L Nonn. Department of Pathology, University of Illinois at Chicago, 840 S Wood St., Chicago, IL 60612, USA; University of Illinois Cancer Center, Chicago, IL 60612, USA
- Board 60: VITAMIN D METABOLITES IN MICROALGAE. AC Baur^{1,2}, AL Hoeger³, C Griehl³, GI Stangl^{1,2}. ¹Institute of Agricultural and Nutritional Sciences, Martin Luther University Halle-Wittenberg, Germany. ²Competence Cluster for Nutrition and Cardiovascular Health, Halle-Jena-Leipzig (nutriCARD), Germany. ³Group Algae Biotechnology, Department of Applied Biosciences and Process Technology, Anhalt University of Applied Sciences, Koethen, Germany

- Board 61: HUMAN INTERVENTION STUDY ON THE BIOAVAILABILITY OF VITAMIN D FROM UVB-EXPOSED WHEAT GERM OIL. AC Baur^{1,2}, S Philipp^{1,2}, S Staudt^{2,3}, S Lorkowski^{2,3}, GI Stangl^{1,2}, CA Dawczynski^{2,3}. ¹Institute of Agricultural and Nutritional Sciences, Martin Luther University Halle-Wittenberg, Germany. ²Competence Cluster for Nutrition and Cardiovascular Health (nutriCARD) Halle-Jena-Leipzig, Germany. ³ Institute of Nutritional Sciences, Friedrich Schiller University Jena, Germany
- Board 62: ELEVATING SERUM 25-HYDROXYVITAMIN D LEVELS IMPROVES BONE VOLUME AND MINERAL DENSITY IN *HYP* MICE. KR Barratt, RK Sawyer, PH Anderson School of Pharmacy and Medical Sciences, University of South Australia
- Board 63: VITAMIN D INHIBITS SECRETION OF TNF- INDUCED PRO-INFLAMMATORY CYTOKINES (IL-8) FROM HEPATOCYTES: POTENTIAL MECHANISM FOR THE ROLE OF VITAMIN D IN NAFLD? O.A. Akinyemi, S. Lanham-New, R. Simmonds. School of Biosciences and Medicine, Faculty of Health and Medical Sciences, University of Surrey, United Kingdom
- Board 64: INVESTIGATION FOR A RADICAL CURE OF COPD USING 1,25-DIHYDROXYVITAMIN D3 AIMED AT ALVEOLAR REGENERATION. T Akita, C Yamashita. Department of Pharmaceutics and Drug Delivery, Faculty of Pharmaceutical Sciences, Tokyo University of Science, Chiba-ken, Japan
- Board 65: VITAMIN D STATUS IN PREGNANCY AND POSTPARTUM DEPRESSIVE SYMPTOMS. IM Nielsen^{1,2}, N Bilenberg¹, C Dalgård⁴, HT Christesen⁵, R Wesselhöft^{1,6}. ¹Department of Child and Adolescent Mental Health, Mental Health Services in the Region of Southern Denmark; Department of Clinical Research, Faculty of Health Sciences, University of Southern Denmark ²Psychiatric Research Academy, Denmark ³Department of Clinical Research, Faculty of Health Sciences, University of Southern Denmark ⁴Department of Public Health, Environmental Medicine, University of Southern Denmark ⁵Hans Christian Andersen Children's Hospital, Odense University Hospital, Denmark ⁶Clinical Pharmacology and Pharmacy, Institute of Public Health, University of Southern Denmark
- Board 66: ASSOCIATION BETWEEN FREE 25-HYDROXYVITAMIN D AND PARATHYROID HORMONE IN TWO POPULATIONS OF AFRICAN ORIGIN, KUMASI, GHANA AND MAYWOOD, IL, USA. H Kapadia H Kramer, A Luke, H Adil, R Durazo-Arvizu. Loyola University Chicago
- Board 67: Ca²⁺-MEDIATED APOPTOSIS IN BREAST CANCER CELLS AND ADIPOCYTES: A NOVEL TARGET FOR THE PREVENTION AND TREATMENT OF BREAST CANCER. Igor N. Sergeev. Health and Nutritional Sciences, South Dakota State University, Brookings, SD, USA
- Board 68: BENEFICIAL EFFECTS OF VITAMIN D COMBINED WITH ENDURANCE EXERCISE TRAINING ON WEIGHT LOSS IN HIGH FAT DIET-INDUCED OBESE MICE. J Cho¹⁾, E Park^{1,2)}. ¹Diabetes Obesity and Metabolism Institute, Icahn School of Medicine at Mount Sinai, NY, USA, ²Department of Food and Nutrition, Hannam University, Korea
- Board 69: ASSOCIATION BETWEEN SERUM VITAMIN D LEVELS AND FUNCTIONAL FITNESS ON NON-ALCOHOLIC FATTY LIVER DISEASE INDEX IN ELDERLY ADULTS. J Cho¹⁾, E Park^{1,2)} ¹Diabetes Obesity and Metabolism Institute, Icahn School of Medicine at Mount Sinai, NY, USA. ²Department of Food and Nutrition, Hannam University, Korea
- Board 70: HIGH PREVALENCE OF SECONDARY HYPERPARATHYROIDISM AS A CONSEQUENCE OF VITAMIN D DEFICIENCY IN OUTPATIENTS FROM A TERTIARY CARE CENTER. SC Reich, TMRL Costa, CA Moreira, CL Boguszewski, VZC Borba. Serviço de Endocrinologia ne Metabologia do Hospital de Clinicas da Universidade Federal do Parana (SEMPR), Curitiba, Brazil
- Board 71: VITAMIN D LEVELS IN RECENTLY ARRIVED IMMIGRANTS IN SWEDEN. A Björk. Department of Medical Sciences, Uppsala university, Sweden

- Board 72: VALIDATION OF A NEW POINT-OF-CARE ASSAY FOR DETERMINATION OF 25 OH-VITAMIN D CONCENTRATIONS IN FINGER-PRICK BLOOD SAMPLES. A Aksan^{1,2}, K Boettger^{1,3}, F Walzer⁴, D Szellas⁴, FP Armbruster⁴, J Stein^{1,2,3}. ¹Interdisciplinary Crohn Colitis Center Rhein-Main, Frankfurt am Main; ²Institute of Pharmaceutical Chemistry, Goethe University Frankfurt am Main; ³DGD Clinics Sachsenhausen, Frankfurt am Main; ⁴Immundiagnostik AG, Bensheim, Germany
- Board 73: WHAT IS THE BEST WAY TO DETERMINE VITAMIN D STATUS IN CHRONIC INFLAMMATORY CONDITIONS: TRADITION OR INNOVATION? A Aksan^{1,2}, K Boettger^{1,3}, N Hein³, Y Caicedo-Zea⁴, I Diehl⁴, C Schumann⁴, FP Armbruster⁴, J Stein^{1,2,3}. ¹Interdisciplinary Crohn Colitis Center Rhein-Main, Frankfurt am Main; ²Institute of Pharmaceutical Chemistry, Goethe University Frankfurt am Main; ³DGD Clinics Sachsenhausen, Frankfurt am Main; ⁴Immundiagnostik AG, Bensheim, Germany
- Board 74: DIETARY VITAMIN D AMELIORATES HEPATIC OXIDATIVE STRESS AND INFLAMMATORY EFFECTS OF DIETHYLNITROSAMINE IN RATS. IB. Adelani¹, EO. Ogadi¹, OA. Rotimi¹, EN. Maduagwu² and SO. Rotimi¹. ¹Department of Biochemistry, College of Science and Technology, Covenant University, Ota, Ogun state, Nigeria; ²Department of Biochemistry, Chrisland University, Abeokuta, Ogun state, Nigeria

Poster Session II: Friday, May 31, 2019

- Board 25: VITAMIN D RANDOMISED CONTROLLED TRIALS (RCTS) ARE OFTEN UNDERPOWERED: RESULTS FROM A SIMULATION-BASED APPROACH TO ESTIMATING POWER AND SAMPLE SIZE THAT ACCOUNTS FOR A LARGE INTER-INDIVIDUAL AND INTRA-INDIVIDUAL VARIABILITY. L Zgaga, R Mangan, J Wyse. Trinity College Dublin, Ireland
- Board 26: NEIGHBORHOOD DISORDER PREDICTS LOWER SERUM VITAMIN D LEVELS IN PREGNANT AFRICAN AMERICAN WOMEN C Giurgescu¹, J Woo², MD Koenig³, CG Engeland⁴, MA Kominiarek⁵, R White-Traut⁶. ¹Ohio State University, ²Texas Woman's University, ³University of Illinois Chicago, ⁴Penn State University, ⁵Northwestern University, ⁶Children's Hospital of Wisconsin
- Board 27: DOES VITAMIN D STATUS IMPACT PHYSICAL QUALITY OF LIFE IN MINORITY PREGNANT WOMEN? J Woo, S Penckofer, C Giurgescu, B Hollis Texas Woman's University, Loyola University Chicago, Ohio State University, Medical University of South Carolina
- Board 28: THE INCIDENCE OF HIP FRACTURES IN LONG-TERM CARE HOMES IN SASKATCHEWAN: DOES VITAMIN D SUPPLEMENTATION PLAY A ROLE? SJ Whiting, W Li, and L Thorpe. University of Saskatchewan and Health Quality Council Saskatoon SK Canada
- Board 29: VITAMIN D INTAKES OF CANADIANS FROM FOOD AND SUPPLEMENTS: CANADIAN COMMUNITY HEALTH SURVEYS (CCHS) 2004 AND 2015 COMPARED. SJ Whiting, N Islam, RP Patil, H Vatanparast. University of Saskatchewan, Saskatoon SK Canada S7N 2Z4
- Board 30: LEVELS OF TOTAL AND FREE 25-HYDROXYVITAMIN D IN PATIENTS WITH PRIMARY HYPERPARATHYROIDISM. X Wang, L Meng, C Su, S Shapses. Department of Medicine, Rutgers-Robert Wood Johnson Medical School and Department of Nutritional Sciences, Rutgers University, New Brunswick, NJ 08901
- Board 31: RISK FACTORS FOR FRACTURES IN NEW ZEALAND SCHOOL CHILDREN. M Delshad¹, KL Beck¹, CA Conlon¹, O Mugridge¹, MC Kruger² and PR von Hurst¹. ¹School of Sport, Exercise and Nutrition, College of Health, Massey University, Auckland, NZ; ²School of Health Sciences, College of Health, Massey University, Palmerston North, NZ
- Board 32: THE RELATIONSHIP OF 25-HYDROXYVITAMIN D CONCENTRATIONS AND INDIVIDUAL-LEVEL SOCIOECONOMIC STATUS. TD Thacher, DV Dudenkov, KC Mara, JA Maxson, CI Wi, YJ Juhn. Mayo Clinic, Rochester, MN 55905
- Board 33: VITAMIN D STATUS AS A RISK FACTOR FOR MOBILITY, BUT NOT MORTALITY, AFTER HIP FRACTURE SURGERY. L Hao, Y Schlüssel, JL Carson, SA Shapses. Department of Nutritional Sciences, Rutgers University-New Brunswick and Department of Medicine, Rutgers-Robert Wood Johnson Medical School, New Brunswick, NJ, USA
- Board 34: RISK FACTORS OF REPORTING ADVERSE EVENTS AND STUDY WITHDRAWAL IN A POPULATION-BASED RANDOMIZED CONTROLLED TRIAL OF VITAMIN D SUPPLEMENTATION. Z Malihi¹, Z Wu¹, CMM Lawes¹, J Sluyter¹, D Waayer¹, L Toop², K-T Khaw³, CA Camargo Jr⁴, R Scragg¹. ¹School of Population Health, University of Auckland, New Zealand; ² Department of Public Health & General Practice, The University of Otago, New Zealand; ³ Department of Public Health, University of Cambridge, England; ⁴ Department of Emergency Medicine, Massachusetts General Hospital, USA
- Board 35: NON-LINEAR ASSOCIATIONS OF 25-HYDROXYVITAMIN D CONCENTRATIONS WITH RISK OF CARDIOVASCULAR DISEASE AND ALL-CAUSE MORTALITY: RESULTS FROM THE HEALTH IMPROVEMENT NETWORK (THIN) DATABASE. FL Crowe¹, R Thayakaran¹, N Gittoes^{2,3}, M Hewison², R Scragg⁴, K Nirantharakumar¹. ¹ Institute of Applied Health Research, ² Institute of Metabolism and Systems Research, and ³ Centre for Endocrinology, Diabetes and Metabolism (NG), College of Medical and Dental Sciences, all at University of Birmingham, UK; ⁴ School of Population Health, University of Auckland, New Zealand

- Board 36: WHAT FACTORS MODIFY THE EFFECT OF MONTHLY VITAMIN D SUPPLEMENTATION ON 25-HYDROXYVITAMIN D CONCENTRATIONS? R Scragg¹, Z Wu¹, IR Reid², A Beros¹, J Sluyter¹, D Waayer¹, CMM Lawes¹, L Toop³, K-T Khaw⁴, CA Camargo Jr⁵. ¹ School of Population Health, University of Auckland, New Zealand; ² Department of Medicine, University of Auckland, New Zealand; ³ Department of Public Health & General Practice, The University of Otago, New Zealand; ⁴ Department of Public Health, University of Cambridge, England; ⁵ Department of Emergency Medicine, Massachusetts General Hospital, USA
- Board 37: BELIEFS AND RESPONSIBILITIES REGARDING VITAMIN D DEFICIENCY: A DRUG FOCUSED THEMATIC ANALYSIS AMONG SWEDISH PRIMARY CARE PHYSICIANS. O Nordqvist, I Wåhlin, M Carlsson. Region Kalmar County and Linnaeus University, Kalmar, Sweden
- Board 38: DEFINITION, DISSECTION, AND IN VIVO DELETION OF COMPLEX GENOMIC ENHANCERS REVEAL A KIDNEY SPECIFIC *CYP27B1* PSEUDO-NULL MOUSE AND LOSS OF *CYP24A1* REGULATION BY FGF23 AND PTH. MB Meyer¹, NA Benkusky¹, M Kaufmann², SM Lee¹, G Jones², and JW Pike¹. ¹Department of Biochemistry, University of Wisconsin-Madison, WI; ²Department of Biomedical and Molecular Sciences, Queens University, Kingston, Ontario
- Board 39: VITAMIN D APPEARS TO BE ABLE TO SAFELY CONTROL AUTOIMMUNE DISEASES BY RESTORING THE FUNCTIONAL STATUS OF REGULATORY T CELLS IN A DOSE-DEPENDENT MANNER. PJ McCullough¹, JB Travers², DS Lehrer³. ¹Summit Behavioral Healthcare. Cincinnati, Ohio. ² Pharmacology & Toxicology. Boonshoft School of Medicine. Dayton, OH. ³ VA Medical Center. Cincinnati, OH
- Board 40: VITAMIN D IS A SAFE, EFFECTIVE, WELL-TOLERATED AND UNDERUTILIZED TREATMENT FOR PSORIASIS. PJ McCullough¹, DS. Lehrer². ¹Summit Behavioral Healthcare, Cincinnati, Ohio. ² VA Medical Center. Cincinnati, OH
- Board 41: VITAMINDWIKI: YOUR GO-TO VITAMIN D WEBSITE. H. Lahore, VitaminDWiki, Port Townsend, WA
- Board 42: INCREASING 25-HYDROXYVITAMIN D VALUES AND RISK OF FRACTURE: A POPULATION-BASED RETROSPECTIVE COHORT STUDY. AJ Aul, DV Dudenkov, KC Mara, YJ Juhn, CI Wi, JA Maxson, TD Thacher. Mayo Clinic, Rochester, MN
- Board 43: IDENTIFYING A POINT OF CHANGING ACTIVE VITAMIN D TO 25(OH)D RATIO – IMPLICATIONS FOR INTERPRETING LOW 25(OH)D MEASUREMENTS? J ÖBERG, G GRIMNES, R JORDE. Tromsø Endocrine Research Group, Institute of Clinical Medicine, UiT-the Arctic University of Norway
- Board 44: VITAMIN D METABOLITES AND BONE MINERAL DENSITY IN ADOLESCENTS WITH SEVERE DEFICIENCY AND SUFFICIENT VITAMIN D LEVELS. J ÖBERG, G GRIMNES, R JORDE, A WINTHER, N EMAUS. Tromsø Endocrine Research Group, Institute of Clinical Medicine, UiT-the Arctic University of Norway
- Board 45: FOUR MONTHS VITAMIN D SUPPLEMENTATION TO VITAMIN D INSUFFICIENT INDIVIDUALS DOES NOT IMPROVE MUSCULAR STRENGTH: A RANDOMIZED CONTROLLED TRIAL. G Grimnes, J.Kubiak, R Jorde. Tromsø Endocrine Research Group, Department of Clinical Medicine, UiT The Arctic University of Norway, Tromsø, Norway, and Medical Department, University Hospital of North Norway, Tromsø, Norway
- Board 46: EFFECTS OF VITAMIN D SUPPLEMENTATION ON BONE TURNOVER MARKERS IN SUBJECTS WITH VITAMIN D DEFICIENCY. R Jorde^a, AK Stunes^b, PM Thorsby^c, J Kubiak^a, R Joakimsen^a, G Grimnes^a, U Syversen^b. ^a UiT The Arctic University of Norway, Tromsø, Norway; ^b Norwegian University of Science and Technology, Trondheim, Norway and Clinic of Medicine, St. Olavs Hospital, Trondheim University Hospital, Trondheim, Norway; ^c Hormone Laboratory, Oslo University Hospital, Oslo, Norway.

- Board 47: DETERMINANTS OF SERUM LEVELS OF BONE TURNOVER MARKERS AND OTHER BONE-RELATED SUBSTANCES, THEIR INTER-CORRELATION AND TRACKING OVER TIME. R Jorde^a, AK Stunes^b, PM Thorsby^c, J Kubiak^a, R Joakimsen^a, G Grimnes^a, U Syversen^b. ^aUiT The Arctic University of Norway, Tromsø, Norway; ^bNorwegian University of Science and Technology, Trondheim, Norway and Clinic of Medicine, St. Olavs Hospital, Trondheim University Hospital, Trondheim, Norway; ^cHormone Laboratory, Oslo University Hospital, Oslo, Norway
- Board 48: EFFECT OF UVB-LIGHT ON VITAMIN D STATUS IN SOWS AND PIGLETS – A PILOT STUDY. SS Jakobsen¹, JP Nielsen¹, J Jakobsen². ¹University of Copenhagen, Department of Veterinary and Animal Sciences, ²Technical University of Denmark, National Food Institute
- Board 49: VITAMIN D IN WILD AND FARMED ATLANTIC SALMON (*SALMO SALAR*) – WHAT DO WE KNOW? J Jakobsen¹, C Smith², A Bysted¹, KD Cashman³. ¹National Food Institute, Technical University of Denmark, Denmark; ²Bantry Marine Research Station, Cork, Ireland; ³Cork Centre for Vitamin D and Nutrition Research, University College Cork, Cork, Ireland
- Board 50: A DIET HIGH IN PLANT PROTEIN ACCELERATES BONE TURNOVER COMPARED TO A DIET HIGH IN ANIMAL PROTEIN - A 12-WEEK INTERVENTION IN HEALTHY ADULTS. ST Itkonen¹, H Viitakangas¹, E Päiväranta¹, T Pellinen¹, M Erkkola¹, J Risteli², C Lamberg-Allardt¹, A-M Pajari¹. ¹Department of Food and Nutrition, University of Helsinki, Helsinki, Finland, ²University of Oulu, Oulu, Finland
- Board 51: VITAMIN D STATUS IN CANCER PATIENTS IN CZECH REPUBLIC. R Fuchsova, R Kucera, O Topolcan, M Karlikova, H Rezackova, V Treska, L Pecen. University Hospital Pilsen, Czech Republic
- Board 52: THE RESPONSE OF VITAMIN D METABOLITES TO A SINGLE BOUT OF RESISTANCE AND ENDURANCE EXERCISE IN HEALTHY YOUNG ADULTS. KB Evensen¹, MK Gustafsson², PM Thorsby⁵, U Syversen^{1,4}, MP Mosti^{1,4}. ¹Department of Clinical and Molecular Medicine and ²Department of Public Health and Nursing, Norwegian University of Science and Technology, Trondheim, Norway³. Division of Mental Health Care and ⁴Department of Endocrinology, St. Olavs Hospital, Trondheim, Norway.⁵Hormone Laboratory, Department of Medical Biochemistry, Oslo University Hospital, Aker Sykehus, Oslo, Norway
- Board 53: MAY ETHNIC DIFFERENCES IN VITAMIN D-BINDING PROTEIN EXPLAIN THE DIFFERENCE IN PREVALENCE OF VITAMIN D DEFICIENCY IN A MULTI-ETHNIC PREGNANT POPULATION? ÅR Eggemoen^{1,2}, AK Jenum¹, PM Thorsby³. ¹Department of General Practice, Institute of Health and Society, University of Oslo, N-0318 Oslo, Norway, ²Norwegian National Advisory Unit on Women's Health, Oslo University Hospital, Norway, ³Hormone Laboratory, Dep of Medical Biochemistry, Oslo University Hospital, Norway
- Board 54: WINTERTIME VITAMIN D STATUS AND ITS RELATED RISK FACTORS AMONG CHILDREN LIVING IN AUCKLAND, NEW ZEALAND. M Delshad¹, KL Beck¹, CA Conlon¹, O Mugridge¹, MC Kruger² and PR von Hurst¹. ¹School of Sport, Exercise and Nutrition, College of Health, Massey University, Auckland, NZ; ²School of Health Sciences, College of Health, Massey University, Palmerston North, NZ
- Board 55: VITAMIN D DEFICIENCY IS ASSOCIATED WITH LONGER SLEEP DURATION ESPECIALLY IN YOUNGER CHINESE POPULATIONS LIVING IN MACAU, CHINA. X Liu¹, L Ke², M Abboud³, E Mpofu^{4,5,6}, J Ho², TC Brennan-Speranza¹, RS Mason¹, KE Brock¹. ¹Physiology, University of Sydney, ²Macau Hypertension League, China ³Zayed University, Dubai, UAE, ⁴Faculty of Health Science, University of Sydney, Sydney, Australia, ⁵University of North Texas, ⁶University of Johannesburg, South Africa
- Board 56: HOW ARE RCT'S NECESSARY FOR VITAMIN D AND HEALTH OUTCOMES? C. Baggerly, S. McDonnell, C. French. GrassrootsHealth, Encinitas, CA
- Board 57: VITAMIN D ADEQUACY PREVAILS IN PREGNANT WOMEN IN SOUTHERN ONTARIO: RESULTS FROM THE BE HEALTHY IN PREGNANCY RCT. M Perreault, SA Atkinson, CJ Moore, G Fusch, MF Mottola, and the BHIP study team. Department of Pediatrics, McMaster University and School of Kinesiology, Western University, Ontario, Canada

- Board 58: INHIBITION OF VITAMIN D CATABOLISM PROTECTS THE INTESTINE FROM 5-FLUOROURACIL INDUCED GASTROINTESTINAL MUCOSITIS. AM Stringer, AJ Shoubridge, KR Barratt, RK Sawyer, CL Sylvester, PH Anderson. School of Pharmacy and Medical Sciences, University of South Australia, Adelaide, Australia
- Board 59: THE 1,25(OH)₂D₃-REGULATED GENE RANKL AFFECTS GROWTH OF TESTICULAR GERM CELL TUMORS. CH Andreassen¹, M Lorenzen¹, JE Nielsen², A Juul², M Blomberg Jensen¹. ¹ Group of Skeletal, Mineral and Gonadal Endocrinology, Department of Growth and Reproduction, Rigshospitalet, Copenhagen, Denmark. ² Department of Growth and Reproduction, Rigshospitalet, Copenhagen, Denmark
- Board 60: KEEPING THE JUICE INSIDE - VITAMIN D-METABOLITES AND CHICKEN BREAST MEAT RIPENING. K. Buehler¹, H. Bachmann¹, Kh. Saikhlai². ¹Herbonis Animal Health GmbH, Augst, Switzerland; ²Bangkok Animal Research Center Co. Ltd., Bangkok, Thailand
- Board 61: VITAMIN D INTAKES OF AMERICAN CHILDREN HAVE NOT CHANGED IN PAST DECADE: IMPLICATIONS FOR SCHOOL MEAL PROGRAMS. MS Calvo¹, SJ Whiting². ¹ Food and Drug Administration (retired) USA, ² University of Saskatoon, Saskatchewan, Canada
- Board 62: p38 MAPK AND GADD45 ENHANCE VITAMIN D SIGNALING ON TRPV6 MRNA INDUCTION IN INTESTINAL CELLS. M Ishizawa, M Makishima. Division of Biochemistry, Department of Biomedical Sciences, Nihon University School of Medicine, Japan
- Board 63: DIETARY PROTEIN AND CALCIUM MODULATE PARATHYROID VITAMIN D RECEPTOR EXPRESSION IN YOUNG GOATS. MR Wilkens, N Schnepel, AS Muscher-Banse. Institute for Physiology and Cell Biology, University of Veterinary Medicine Hannover, 30173 Hannover, Germany
- Board 64: EFFECT OF VITAMIN D NUTRITION (VDN) ON DISEASE INDICES IN PATIENTS WITH PRIMARY HYPERPARATHYROIDISM (PHPT). J. Miragaya, S.D. Rao, N. Parikh M. Mahan. Bone & Mineral Research Laboratory and Department of Biostatistics, Henry Ford Health System, Detroit, MI, 48202
- Board 65: A RANDOMISED-CONTROLLED TRIAL TO ASSESS THE IMPACT OF VITAMIN D₃-FORTIFIED MILK ON WINTERTIME VITAMIN D STATUS IN ADULTS. HR Neill¹, RR Weir¹, M Johnston², C Lewis², RK Price¹, AM Fearon³, WC McRoberts³, S Stewart³, EJ Laird⁴, M Healy⁵, H van Kranen⁶, P den Outer⁶, MS Mulhern¹, JJ Strain¹, LK Pourshahidi¹. ¹ Nutrition Innovation Centre for Food & Health (NICHE), Ulster University, UK; ² Dairy Council for Northern Ireland, Belfast, UK; ³ Agri-Food & Biosciences Institute, Belfast, UK, ⁴ School of Medicine, Trinity College Dublin, Ireland; ⁵ Department of Biochemistry, St. James's Hospital, Dublin, Ireland; ⁶ National Institute of Public Health & Environment (RIVM), The Netherlands
- Board 66: IS BONE MINERAL DENSITY AMONG AFRICAN AMERICAN AN ANCESTRAL NORM? H Darji, H Kramer, A Luke, R Durazo-Arvizu. Public Health Sciences, Loyola University, Maywood, IL
- Board 67: CLINICAL IMPORTANCE OF 25-HYDROXYVITAMIN D3 FOR RICKETS. COMPARATIVE STUDY OF 25(OH)D3 TREATMENT TO CYP27B1 KNOCKOUT OR VDR (R270L) RATS. M Nishikawa, K Abe, K Yasuda, H Mano, S Ikushiro, T Sakaki. Toyama Pref. Univ., Toyama, Japan
- Board 68: VITAMIN D LEVELS AND COGNITIVE FUNCTION IN OLDER ADULTS WITH DIABETES MELLITUS TYPE 2. W Serrano, J Bricio-Barrios, E Ríos-Bracamontes, M Huerta, X Trujillo, M Ríos-Silva. University Center for Biomedical Research, University of Colima, Colima, México
- Board 69: VITAMIN D DEFICIENCY CARDIOMYOPATHY IN SCOTLAND: A RETROSPECTIVE REVIEW OF THE LAST DECADE. H McDevitt, R Ferguson, L Hunter. Royal Hospital for Children, Glasgow, UK

- Board 70: THE IMPACT OF SUPPLEMENTAL UV LIGHTING AND A DIETARY ADDITIVE ON THE VITAMIN D CONTENT OF BOVINE MILK. WC McRoberts¹, CP Ferris², LK Pourshahidi³, AW Gordon¹, EJ McDonald⁴. ¹Agri-Food & Biosciences Institute, Newforge Lane, Belfast, UK; ²Agri-Food & Biosciences Institute, Largepark, Hillsborough, UK; ³Nutrition Innovation Centre for Food & Health (NICHE), Ulster University, UK; ⁴Devenish Nutrition Ltd, Belfast, UK
- Board 71: THE MONTH-OF-BIRTH EFFECT ON MUSCULAR MASS AND STRENGTH AMONG OLDER ADULTS. G Chevallereau, F R Herrmann, G Duval, AM Schott, C Annweiler. Department of Geriatrics, University at Angers, France
- Board 72: VITAMIN D INSUFFICIENCY AND MUSCULAR FATIGABILITY AMONG OLDER WOMEN. G Chevallereau, G Duval, AM Schott, C Annweiler. Department of Geriatrics, University at Angers, France
- Board 73: A NOVEL CLINICAL DIAGNOSTIC TOOL FOR IDENTIFYING OLDER ADULTS WITH HYPOVITAMINOSIS D. C Annweiler, G Chevallereau, B Fantino, A Kabeshova, J Riou. Department of Geriatrics, University at Angers, France
- Board 74: EFFECT OF VITAMIN D FORTIFIED FOODS ON BONE MARKERS AND MUSCLE STRENGTH IN WOMEN OF PAKISTANI AND DANISH ORIGIN LIVING IN DENMARK: A RANDOMISED CONTROLLED TRIAL. I M Grønberg¹, I Tetens^{1,2}, E W Andersen³, M Kristensen⁴, R E K Larsen⁴, T L L Tran⁴, R Andersen¹. ¹National Food Institute, Technical University of Denmark, Lyngby, Denmark; ²Vitality - Centre for good older lives, Department of Nutrition, Exercise and Sports, University of Copenhagen; ³Danish Cancer Society, Section for Statistics and Pharmacoepidemiology, Copenhagen, Denmark; ⁴Department of Nursing and Nutrition, Faculty of Health, University College Copenhagen, Denmark.