

POSTERS (2)

	<i>Attended</i>
Oral Posters P001-P020 Bone Formation, Cartilage, and Bone Matrix P021- P135 Bone Resorption and its Regulation P136-P182	Thursday 13:00-14:00
Cancer and Metabolic Bone Diseases other than Osteoporosis P183-P237 Osteoporosis: Pathophysiology, Genetics and Epidemiology P238-P337	Friday 13:00-14:00
Osteoporosis: Assessment and Treatment P338 -P490	Saturday 13:00-14:00

CANCER AND METABOLIC BONE DISEASES OTHER THAN OSTEOPOROSIS

These posters will be attended on Friday, 12 May 2006, 13:00 – 14:00

P183 THE CROSSTALK BETWEEN BONE AND CANCER CELLS: ALTERATIONS OF OSTEOBLASTS IN GENE EXPRESSION AND BEHAVIOUR ARE METASTASIS-TYPE SPECIFIC

K. Ackermann*¹, W. Pyerin¹

¹Biochemical Cell Physiology A135, Deutsches Krebsforschungszentrum, Heidelberg, Germany

P184 CASE REPORT OF A PATIENT WITH A DIAGNOSIS OF ANKYLOSING SPONDYLITIS AND CHONDROSARCOMA OF SACROILIAC JOINT

M. Graberski Matasovic¹, A. Aljinovic*¹, M. Paar-Puhovski¹, M. Jaksic¹

¹Department of physical medicine, rehabilitation and rheumatology, General hospital Sveti Duh, Zagreb, Croatia

P185 CALCITROPIC HORMONES IN WOMEN WITH POLYCYSTIC OVARY SYNDROME

M. S. Ardawi*¹, A. A. Rouzi²

¹Clinical Biochemistry, ²Obstetrics and Gynecology, Faculty of Medicine and King Abdulaziz University Hospital, Jeddah, Saudi Arabia

P186 EFFECT OF CLODRONATE ON BONE MASS MINERALIZATION IN PROSTATE CARCINOMA PATIENTS

T. Banek*¹, L. Banek², G. Kurnik¹

¹Department of Nuclear Medicine, Clinical Hospital Dubrava, ²Institute of Histology and Embriology, School of Medicine, University of Zagreb, Zagreb, Croatia

P187 TRANSCRIPTOME ANALYSIS REVEALS AN OSTEOMIMETIC PHENOTYPE FOR HUMAN BONE METASTATIC BREAST CANCER CELLS

A. Bellahcène*¹, R. Bachelier², C. Detry¹, R. Lidereau³, P. Clézardin², V. Castronovo¹

¹Metastasis Research Laboratory, University of Liège, Liège, Belgium, ²INSERM, Unit Research 644, Lyon, ³INSERM Unit Research 735, Centre René Huguenin, St-Cloud, France

P188 BONE SIALOPROTEIN OVEREXPRESSION IN RESPONSE TO SERUM DEPRIVATION AND APOPTOTIC STRESS PROMOTES CELL SURVIVAL IN CANCER CELLS

A. Bellahcène*¹, F. Journé², M. Chaplet¹, N. Kheddoumi², J. J. Body², V. Castronovo¹

¹Metastasis Research Laboratory, University of Liège, Liège, ²Laboratory of Endocrinology-Bone Diseases, Department of Medicine, Institut Jules Bordet Université Libre de Bruxelles, Bruxelles, Belgium

P189 ASSOCIATION BETWEEN THE TNFRSF11B GENE PROMOTER POLYMORPHISM 163A/G AND PAGET'S DISEASE OF BONE IN A BELGIAN POPULATION

G. Beyens*¹, F. De Freitas¹, F. Vanhoenacker², L. Verbruggen³, H. Zmierczak⁴, J. Devogelaer⁵, W. Van Hul⁶

¹Department of Medical Genetics, University of Antwerp, Wilrijk, ²Department of Radiology, University Hospital of Antwerp, Antwerp, ³Department of Rheumatology, University Hospital of Brussels, Brussels, ⁴Department of Endocrinology and Metabolic diseases, University Hospital of Ghent, Ghent, ⁵Department of Rheumatology, Saint- Luc University Hospital, Brussels, ⁶Department of Medical Genetics, University of Antwerp, Antwerp, Belgium

P190 INTERACTION BETWEEN BONE MICROENVIRONMENT AND CANCER CELLS IN ANIMAL METASTASIS MODELS

S. Blouin¹, N. Josselin¹, M. Baslé¹, **D. Chappard***¹

¹EMI 0335, INSERM, ANGERS, France

P191 BONE MORPHOGENETIC PROTEINS AND THEIR RECEPTORS IN PROSTATE CANCER PATHOGENESIS

D. Bobinac*¹, J. Spanjo², I. Maric¹, G. Dordevic³, E. Mustac³, Z. Fuckar²

¹Department of Anatomy, Faculty of Medicine, ²Department of Urology, Clinical Hospital, ³Department of Pathology, Faculty of Medicine, Rijeka, Croatia

P192 SENSITIZATION OF OSTEOSARCOMA CELLS TO APOPTOSIS BY ONCOSTATIN M DEPENDS ON STAT5 AND P53

C. Chipoy*¹, P. Juin², F. Rédini¹, D. Heymann¹, F. Blanchard¹

¹University of Nantes EA3822 INSERM ERI 7, Medicine Faculty, ²U601, INSERM, Nantes, France

P193 THE DEVELOPMENT OF PAGET'S DISEASE IN PEOPLE WITH INHERITED SQSTM1 MUTATIONS

T. Cundy*¹, M. Bolland¹, P. Tong¹, K. Callon¹, D. Wattie¹, D. Naot¹

¹Department of Medicine, Faculty of Medical and Health Sciences, University of Auckland, Auckland, New Zealand

P194 THE RISK OF MORPHOMETRIC VERTEBRAL FRACTURES IN POSTMENOPAUSAL PATIENTS WITH PRIMARY HYPERPARATHYROIDISM

S. De Geronimo*¹, D. Diacinti², E. Romagnoli², S. Piemonte², F. Fidanza², J. Pepe², E. D'Erasmo², S. Minisola²

¹Dpt of Clinical Sciences, University of Rome La Sapienza, ²Dpt of Clinical Sciences, University of Rome "La Sapienza", Rome, Italy

P195 TUMORAL CALCINOSIS AND CALCIPHYLAXIS PRESENTING IN A HEMODIALYSIS PATIENT

Z. M. Dimitrijevic*¹, M. M. Stojanovic¹, K. R. Paunovic¹, G. J. Paunovic¹, S. B. Ljubenic¹

¹Institute of nephrology and hemodialysis, Clinical Center of Nis, Serbia, Nis, Yugoslavia

P196 INVESTIGATION OF UBIQUITIN-ASSOCIATED DOMAIN MUTATIONS OF SQSTM1 IN SPORADIC HUNGARIAN PATIENTS WITH PAGET'S DISEASE OF BONE

J. Donáth*¹, P. J. r. Gergely¹, A. Blazsek², G. Poór¹

¹Ist. Departement of Rheumatology, ²Laboratory of Molecular Biology, National Institute of Rheumatology and Physiotherapy, Budapest, Hungary

P197 MOLECULAR CHARACTERIZATION OF THE GENETIC DEFECT IN MUTANT PIGS WITH A NON-FUNCTIONING 25-HYDROXYVITAMIN D3 1ALPHA-HYDROXYLASE (CYP27B1)

S. Harabasz*¹, K. Weber¹, R. G. Erben²

¹Institute of Animal Physiology, University of Munich, Munich, Germany, ²Dept. of Natural Sciences, University of Veterinary Medicine, Vienna, Austria

P198 THE EFFECT OF ANTIHISTAMINE AND CORTICOSTEROID TREATMENT ON BONE FRACTURES IN POSTMENOPAUSAL POLLEN ALLERGIC WOMEN

V. Ferencz*¹, S. Mészáros¹, E. Csupor², E. Tóth³, K. Bors⁴, A. Falus⁵, C. Horváth¹

¹*1st Department of Medicine, Semmelweis University, 2The Health Service, Budavár Local Authorities, Budapest, 3Department of Rheumatology, Ferenc Flor County Hospital, Kerepestarsca, 4Regional Osteoporosis Centre Ferencvaros, Ferencváros Local Authorities, 5Department of Genetics, Cell and Immunobiology, Semmelweis University, Budapest, Hungary*

P199 SERUM CALCIUM CONCENTRATION IN THE ELDERLY

E. Franek*¹, L. Napiorkowska¹, K. Safranow², K. Stepień³

¹*Dept of Int Dis, Endocrinology and Diabetology, Central Clinical Hospital MSWiA, Warszawa, 2Dept of Clin Biochemistry, Pomeranian Medical Academy, Szczecin, 3Central Laboratory Unit, Central Clinical Hospital MSWiA, Warszawa, Poland*

P200 THE STX16-TARGETED MOUSE MODEL OF PSEUDOHYPOPARATHYROIDISM TYPE IB PROVIDES EVIDENCE FOR A NEW INTRAGENIC TRANSCRIPT

L. F. Fröhlich*¹, M. Bastepe², H. S. Abu-Zahra², H. Jüppner³

¹*Institute of Pathophysiology, Veterinary University of Vienna, Vienna, Austria, 2Endocrine Unit, 3Endocrine Unit and Pediatric Nephrology Unit, Massachusetts General Hospital and Harvard Medical School, Boston, United States*

P201 THE CHONDROSARCOMA CELL LINE C422 UNDERGOES APOPTOSIS UNDER THE EFFECT OF SIMVASTATIN

A. Arin-Martinez¹, O. Hernandez-Perera¹, N. E. Cabrera-Benitez¹, R. G. Diaz-Peñate¹, R. Perez-Machin¹, A. Marrero-Callico¹, M. C. Garcia-Chicano¹, **J. M. García-Castellano***¹

¹*Laboratory of Molecular Oncology, Unidad de Investigación. Hospital de G. C. Dr. Negrin, Las Palmas de G. C., Spain*

P202 THE STATINS INDUCE CHANGES IN THE EXPRESSION OF TGF-BETA1, FIBRONECTIN-1 AND COLLAGEN IV IN THE CHONDROSARCOMA CELL LINE C422 WITH A SIMULTANEOUS CELL CYCLE ARREST

A. Arin-Martinez¹, O. Hernandez-Perera¹, N. E. Cabrera-Benitez¹, R. Perez-Machin¹, R. G. Diaz-Peñate¹, A. Marrero-Callico¹, M. C. Garcia-Chicano¹, **J. M. García-Castellano***¹

¹*Laboratory of Molecular Oncology, Unidad de Investigación. Hospital de G. C. Dr. Negrin, Las Palmas de G. C., Spain*

P203 INTRANUCLEAR AND CYTOPLASMIC LOCALISATION OF SEQUESTOSOME-1 (P62) AND PROTEASOMAL PROTEINS IN OSTEOCLASTS IN PAGET'S DISEASE: POSSIBLE CORRELATION WITH INCLUSION BODIES?

D. Scott¹, S. Yuen¹, J. Greenhorn¹, **M. Helfrich***¹

¹*Department of Medicine and Therapeutics, Institute of Medical Sciences, University of Aberdeen, Aberdeen, United Kingdom*

P204 FUNCTIONAL AND ULTRASTRUCTURAL STUDIES OF OSTEOCLASTS FROM OSTEOPETROTIC PATIENTS

F. Coxon*¹, K. Mackenzie², J. Greenhorn¹, L. Van Wesenbeeck³, A. Frattinni⁴, A. Pangrazio⁴, A. Villa⁴, P. Odgren⁵, M. Helfrich¹

¹*Department of Medicine and Therapeutics, Institute of Medical Sciences, University of Aberdeen, 2Histology- EM core facility, Institute of Medical Sciences, University of Aberdeen, Aberdeen, United Kingdom, 3Department of Medical Genetics, University and University Hospital Antwerp, Antwerp, Belgium, 4Istituto di Tecnologia Biomedica Avanzate, Consiglio Nazionale delle Ricerche, Segrate, Milano, Italy, 5Department of Cell Biology, University of Massachusetts Medical School, Worcester MA01655, United States*

P205 RECEPTOR ACTIVATOR OF NF-KB- LIGAND (RANKL) PROMOTES CELL MIGRATION OF RANK POSITIVE DU145 HUMAN PROSTATE CANCER CELLS

K. Mori*¹, B. Le Goff¹, C. Charrier¹, D. Heymann¹, F. Rédini¹

¹*University of Nantes EA3822 INSERM ERI 7, Medicine Faculty, Nantes, France*

P206 HUMAN OSTEOSARCOMAS EXPRESS FUNCTIONAL RECEPTOR ACTIVATOR OF NUCLEAR FACTOR-KB (RANK)

K. Mori*¹, F. Gouin¹, A. Riet¹, N. Passuti¹, M. Berreur¹, F. Rédini¹, D. Heymann¹

¹University of Nantes EA3822 INSERM ERI 7, Medicine Faculty, Nantes, France

P207 WNT SIGNALLING IN OSTEOARTHRITIC AND OSTEOPOROTIC BONE

X. Hochet¹, **R. M. Aspden***¹

¹Department of Orthopaedics, University of Aberdeen, Aberdeen, United Kingdom

P208 SONOLOGICAL EVALUATION AND GRADING OF TENDOACHILLIS ENTHESOPATHY IN ALKAPTONURIA

I. J. Jebaraj*^{1,11} A. Rao² N. K. Shyamkumar³

¹Orthopaedic Surgery, Christian Medical College & Hospital, Vellore, India, ^{2,3} Radiodiagnosis, Christian Medical College, Vellore. India, 632 004

P209 RELATIONSHIP BETWEEN BONE MINERAL DENSITY, BONE TURNOVER MARKERS, VITAMIN D METABOLITES, PTH, IGF-1 AND IGFBP-3 STATUS IN CHILDREN AFTER LIVER TRANSPLANTATION

E. Karczmarewicz¹, J. Pawlowska², E. Kryskiewicz¹, E. Skorupa¹, H. Matusik¹, H. Ismail³, J. Ryzko², J. Jankowska², M. Teisseyre², P. Kalicinski³, J. Lukaszkiwicz⁴, J. Socha², **R. S. Lorenc***¹

¹Department of Biochemistry and Experimental Medicine, ²Gastroenterology, Hepatology and Nutrition Clinic, ³Surgery and Transplantation Clinic, The Children's Memorial Health Institute, ⁴Pharmacy Faculty, Medical Academy, Warsaw, Poland

P210 OXANDROLONE STIMULATES ANDROGEN RECEPTOR TRANSLOCATION AND INCREASES BIOMARKERS OF OSTEOBLAST ACTIVITY

L. X. Bi¹, **G. L. Klein***², G. V. Oliveira³, E. G. Mainous¹, W. L. Buford⁴, D. N. Herndon³

¹Oral and Maxillofacial Surgery, ²Pediatrics, ³Surgery, University of Texas Medical Branch and Shriners Burns Hospital, ⁴Orthopaedic Surgery, University of Texas Medical Branch, Galveston, United States

P211 FAS/FAS LIGAND SYSTEM IS IMPORTANT BOTH FOR APOPTOSIS AND DIFFERENTIATION OF MURINE OSTEOBLASTS AND OSTEOCLASTS

N. Kovacic*¹, I. Lukic¹, D. Grcevic², V. Katavic¹, V. Grubisic³, K. Mihovilovic³, P. Croucher⁴, A. Marusic¹

¹Anatomy, ²Physiology, University of Zagreb Medical School, ³Medical School, University of Zagreb, Zagreb, Croatia, ⁴Bone Biology Group, University of Sheffield Medical School, Sheffield, United Kingdom

P212 VARIATIONS OF BONE HISTOMORPHOMETRY IN ADVANCED OSTEOARTHRITIS OF THE FEMORAL HEAD

V. Kusec*¹, M. Staresinic², B. Sebecic², D. Krpan³

¹Clinical Institute of Laboratory Diagnosis, Clinical Hospital Centre Zagreb, ²Surgery Department, Clinical Hospital Merkur, ³Department of Internal Medicine, General Hospital Sv Duh, Zagreb, Croatia

P213 OSTEOPROTEGERIN AND BONE MARKERS IN METABOLIC BONE DISORDERS

V. Kusec*¹, D. Zupanic², J. Vlasic-Tanaskovic², R. Smalcelj³, P. Kes⁴, D. Besic⁵, D. Krpan⁶

¹Clinical Institute of Laboratory Diagnosis, Clinical Hospital Centre Zagreb, Zagreb, ²Clinical Chemistry, General Hospital Pula, Pula, ³Dialysis Center, Clinical Hospital Centre Zagreb, Zagreb, ⁴Dialysis Center, Clinical Hospital Centre Zagreb, Pula, ⁵Dept rheumatology and rehabilitation, ⁶Department of Internal Medicine, General Hospital Sv Duh, Zagreb, Croatia

P214 IMMUNLOCALIZATION AND URINARY EXCRETION OF ALPHA CTX IN METASTATIC BONE DISEASE SECONDARY TO BREAST CANCER

D. J. Leeming*¹, M. Koizumi², G. Delling³, K. Henriksen⁴, M. A. Karsdal⁴, P. Qvist¹, L. B. Tánko⁵, I. Byrjalsen¹

¹Research and Development, Nordic Bioscience Diagnostics, Herlev, Denmark, ²Cancer, Institute Hospital, Tokyo, Japan, ³Institute of Bone Pathology, Universityhospital Hamburg-Eppendorf, Hamburg, Germany, ⁴Pharmos, Bioscience, Herlev, ⁵Clinic, CCB, Ballerup, Denmark

P215 HORMONAL REGULATION OF BONE METASTASIS IN BREAST CANCER

A. S. Levenson*¹, Y. T. Chung¹, J. Wang¹, J. Jarrett¹, R. L. Satcher¹

¹*Orthopaedic Surgery and RHL Comprehensive Cancer Center, Northwestern University Feinberg School of Medicine, Chicago, United States*

P216 EXPRESSION AND REGULATION OF OSTEOPROTEGERIN IN ADIPOSE TISSUE IN VITRO: OSTEOPROTEGERIN AS A NOVEL ADIPOCYTOKINE

D. Kim¹, J. An¹, Y. Rhee¹, S. Park¹, W. Choi², Y. Chung³, **S. Lim***¹

¹*Department of internal medicine, College of Medicine, Yonsei University,* ²*Department of internal medicine, College of Medicine, Hanyang University, Seoul,* ³*Department of internal medicine, College of Medicine, Ajou University, Suwon, South Korea*

P217 EVIDENCE FOR AN IMPORTANT SUSCEPTIBILITY GENE FOR FAMILIAL PAGET'S DISEASE OF BONE ON CHROMOSOME 10P13 (PDB6) IN FAMILIES WITHOUT SQSTM1 MUTATIONS

G. J. A. Lucas*¹, L. J. Hocking², T. Cundy³, G. C. Nicholson⁴, J. P. Walsh⁵, S. H. Ralston¹

¹*Bone Research Group, Molecular Medicine Centre, University of Edinburgh, Edinburgh,* ²*Dept. of Medicine and Therapeutics, University of Aberdeen, Aberdeen, United Kingdom,* ³*Dept. of Medicine, University of Auckland, Auckland, New Zealand,* ⁴*Dept of Clinical and Biomedical Sciences, University of Melbourne, Melbourne,* ⁵*Dept. of Endocrinology and Diabetes, Sir Charles Gairdner Hospital, Perth, Australia*

P218 OSTEOPROTEGERIN AS A MEDIATOR OF BONE PHENOTYPE IN MURINE GENERALISED LYMPHOPROLIFERATIVE DISORDER

I. K. Lukic*¹, N. Kovacic¹, D. Grcevic², V. Katavic¹, S. Ivcevic³, A. Marusic¹

¹*Department of Anatomy,* ²*Department of Physiology and Immunology,* ³*Centre for Functional Genomics, Zagreb University School of Medicine, Zagreb, Croatia*

P219 PROSTATE CANCER AND SKELETAL METASTASIS: IMPACT OF THE BONE MICROENVIRONMENT AND EXTRACELLULAR CALCIUM

J. Liao¹, A. Schneider², N. Datta¹, K. Pienta³, **L. K. McCauley***¹

¹*Periodontics and Oral Medicine, University of Michigan, Ann Arbor,* ²*Diagnostic Sciences and Pathology, University of Maryland, Baltimore,* ³*Internal Medicine, University of Michigan, Ann Arbor, United States*

P220 MUTATION ANALYSES OF 30 FAMILIES WITH HYPOPHOSPHATASIA

T. Michigami*¹, K. Tachikawa¹, T. Kubota¹, K. Ozono²

¹*Department of Environmental Medicine, Osaka Medical Center and Research Institute for Maternal and Child Health, Izumi,* ²*Department of Pediatrics, Osaka University Graduate School of Medicine, Suita, Japan*

P221 ADULT PATIENTS AFFECTED BY OSTEOGENESIS IMPERFECTA HAVE IMPAIRMENT OF DIASTOLIC FUNCTION

S. Migliaccio*¹, G. Barbaro¹, R. Fornari¹, G. Di Lorenzo¹, S. Falcone¹, S. Marzano¹, E. Fabbrini¹, M. Marini¹, C. Lubrano¹, M. Brama¹, G. Prossomariti¹, E. Greco¹, F. Conti¹, G. Spera¹

¹*Cattedra di Medicina Interna, Dipartimento di Fisiopatologia Medica, Università La Sapienza, Roma, Italy*

P222 SUCCESSFUL TREATMENT OF THE POST-TRAUMATIC OSTEOLYSIS OF DISTAL CLAVICLE WITH ALENDRONATE - A CASE REPORT

M. T. K. Mulari*¹, G. Gu², K. Mattila³, K. Parkkola⁴, H. K. Väänänen²

¹*Kiukainen health station, Joint Municipal Health Care Services of Harjavalta region, Panelia,* ²*Dept. of Anatomy, Inst. of Medicine, Univ. of Turku,* ³*Diagnostic Imaging Centre, Turku University Hospital,* ⁴*Health Care Unit, Archipelago Sea Naval Command, Turku, Finland*

P223 BONE TURNOVER MARKERS IN NEWLY DIAGNOSED BREAST CANCER PATIENTS

B. F. Murray*¹, D. Smith², J. J. Brady¹, M. L. Healy², N. O' Higgins³, E. McDermot³, M. J. McKenna⁴, T. J. McKenna⁴

¹Metabolism, ²Endocrinology, ³Surgery, St Vincent's University Hospital, ⁴Endocrinology, St Vincent's University Hospital, Dublin, Ireland

P224 ANTI-METASTATIC AND ANTI-ANGIOGENIC ACTIVITY OF 1,25-DIHYDROXYVITAMIN D3 IN BONE-METASTATIC LUNG CARCINOMA CELLS

K. Nakagawa*¹, T. Okano¹

¹Department of Hygienic Sciences, Kobe Pharmaceutical University, Kobe, Japan

P225 ELEVATED SERUM FGF23 PROTEIN ASSOCIATED WITH TUMOR-INDUCED OSTEOMALACIA: A CASE REPORT

K. Nawrot-Wawrzyniak*¹, F. Varga¹, A. Nader², P. Roschger¹, S. Sieghart³, E. Zwettler¹, S. Lang⁴, K. Klaushofer¹

¹Ludwig Boltzmann Institute of Osteology at Hanusch Hospital of WGKK and AUVA Trauma Centre Meidling, 4th Medical Department, Hanusch Hospital, ²Ludwig Boltzmann Institute of Osteology at Hanusch Hospital of WGKK and AUVA Trauma Centre Meidling, 4th Medical Department and Institute for Pathology, Hanusch Hospital, ³2nd Medical Department, Kaiserin Elisabeth Hospital, ⁴Clinical Institute of Clinical Pathology, University of Vienna Medical School, Vienna, Austria

P226 BONE METABOLISM IN DIALYSED PATIENTS - ARE THERE ANY DIFFERENCES BETWEEN HEMODIALYSIS AND PERITONEAL DIALYSIS?

Z. Nowak*¹, M. Konieczna², Z. Wankowicz¹

¹Department of Nephrology, ²Center of Nuclear Medicine, Central Hospital of Military Institute of Medicine, Warsaw, Poland

P227 ZOLEDRONIC ACID INDUCES OSTEOSARCOMA CELL DEATH BY AIF TRANSLOCATION AND CELL CYCLE ARREST IN S AND G2/M PHASES

B. Ory*¹, F. Blanchard¹, S. Couillaud¹, F. Gouin¹, F. Rédini¹, D. Heymann¹

¹Université de Nantes EA3822 INSERM ERI 7, Medicine Faculty, Nantes, France

P228 PERCUTANEOUS BALLOON KYPHOPLASTY IN PATIENTS WITH PATHOLOGICAL VERTEBRAL BODY FRACTURE CAUSED BY MULTIPLE MYELOMA
R. Pflugmacher*¹

¹Centrum für Muskuloskeletale Chirurgie, Charité-Universitätsmedizin Berlin, Berlin, Germany

P229 NON-VIRAL OSTEOPROTEGERIN GENE TRANSFER INHIBITS THE TUMOR PROGRESSION AND PROLONGS SURVIVAL IN A MOUSE EXPERIMENTAL MODEL OF OSTEOSARCOMA

F. Lamoureux¹, P. Richard², Y. Wittrant¹, V. Trichet¹, B. Pitard², D. Heymann¹, **F. Rédini***¹

¹University of Nantes EA 3822 INSERM ERI 7, ²INSERM U 533, Medicine Faculty, Nantes cedex 1, France

P230 ANTI-TUMOR EFFECTS INDUCED BY DENDRITIC CELL-BASED IMMUNOTHERAPY AGAINST ESTABLISHED OSTEOSARCOMA IN RATS

Y. Wittrant¹, C. Chauvin², F. Lamoureux¹, B. Trinité², F. Hubert², D. Heymann¹, R. Josien², **F. Rédini***¹

¹University of Nantes EA 3822 INSERM ERI 7, Medicine Faculty, Nantes cedex 1, ²INSERM U643, ITERT, Nantes, France

P231 BONE METASTASIS IS INDEPENDENT OF OSTEOLYSIS IN A NUDE MOUSE MODEL OF CANINE PROSTATE CANCER WITH MIXED BONE METASTASES

N. K. Thudi¹, C. K. Martin¹, M. V. P. Nadella¹, W. P. Dirksen¹, J. L. Werbeck¹, **T. J. Rosol***¹

¹Veterinary Biosciences, Ohio State University, Columbus, United States

P232 CARBON DIOXIDE RICH WATER BATHING INCREASES LOCAL VEGF SECRETION IN ISCHEMIC LOWER LIMBS OF DM, ASO PATIENTS

K. Saito*¹, T. Kinoshita², T. Yamamoto², K. Kanachi², H. Miyazaki³, S. Nakamura⁴, M. Nonomura⁵
¹Department of Nephrology, Hemodialysis Center, ²Internal Medicine, ³Rehabilitation, ⁴Cardiology, ⁵Urology, Hemodialysis Center, Kyoto Katsura Hospital, Kyoto, Japan

P233 ACTIVIN A CIRCULATING LEVELS IN PATIENTS WITH PRIMARY OSTEOPOROSIS OR BONE METASTASES FROM BREAST CANCER

C. Sferrazza*¹, L. Incorvaia², G. Di Fede², G. Badalamenti², G. Rotolo¹, S. Fricano², G. Di Lorenzo¹, G. Leto², N. Gebbia², G. Rini¹
¹Department of Internal Medicine, ²Department of Surgery and Oncology, University of Palermo, Palermo, Italy

P234 EXPRESSION AND REGULATION OF TOLL-LIKE RECEPTOR 2 BY IL-1B IN HUMAN ARTICULAR CHONDROCYTES

S. L. Su*¹
¹Medical Affairs Bureau, Ministry of National Defense, Taipei, Taiwan

P235 TISSUE-SPECIFIC PARTIAL VITAMIN D AGONISM/ANTAGONISM IN CALCIUM AND BONE HOMEOSTASIS BY THE NOVEL VITAMIN D ANALOG ZK191784

B. C. J. Van der Eerden*¹, T. Nijenhuis², J. G. J. Hoenderop², H. A. P. Pols¹, H. Weinans³, R. J. M. Bindels², J. P. T. M. Van Leeuwen¹
¹Internal Medicine, Erasmus MC, Rotterdam, ²Cell Physiology, NCMLS, Radboud University medical Centre, Nijmegen, ³Orthopedics, Erasmus MC, Rotterdam, Netherlands

P236 ZOLEDRONIC ACID CAN NORMALIZE BONE MASS DENSITY IN THE REGION OF OSTEOBLASTIC AND OSTEOLITIC METASTASIS

K. F. Vartanian*¹
¹Radiology, Russian Academy for Advanced Medical Studies, Moscow, Russian Federation

P237 IDENTIFICATION AND FUNCTIONAL CHARACTERIZATION OF A NOVEL MUTATION IN THE CALCIUM-SENSING RECEPTOR GENE IN FAMILIAL HYPOCALCIURIC HYPERCALCEMIA

K. Zajickova*¹, J. Vrbikova², D. Goltzman¹, G. N. Hendy¹
¹Calcium Research Laboratory, Royal Victoria Hospital, Montreal, Canada, ²Clinical Endocrinology, Institute of Endocrinology, Prague, Czech Republic

OSTEOPOROSIS: PATHOPHYSIOLOGY, GENETICS AND EPIDEMIOLOGY

These posters will be attended on Friday, 12 May 2006, 13:00 – 14:00

P238 ETHNIC DIFFERENCES IN THE EFFECTS OF SUBCUTANEOUS AND VISCERAL FAT ON BONE MINERAL CONTENT IN PRE-PUBERTAL CHILDREN

A. Afghani*¹, M. I. Goran²
¹College of Health Sciences, Touro University International, Cypress, ²Departments of Preventive Medicine, Physiology and Biophysics, University of Southern California, Los Angeles, United States

P239 INVERSE ASSOCIATION BETWEEN SYSTOLIC BLOOD PRESSURE AND BONE MINERAL CONTENT AND DENSITY IN OVERWEIGHT LATINO CHILDREN WITH A FAMILY HISTORY OF TYPE 2 DIABETES

A. Afghani*¹, M. I. Goran²
¹College of Health Sciences, Touro University International, Cypress, ²Departments of Preventive Medicine, Physiology and Biophysics, University of Southern California, Los Angeles, United States

P240 OSTEOPOROSIS, BONE TURNOVER MARKERS AND BONE MINERAL DENSITY IN PATIENTS WITH THALASSEMIA MAJOR

M. S. Ardawi*¹, M. H. Qari²

¹Clinical Biochemistry, ²Hematology, Faculty of Medicine and King Abdulaziz University Hospital, Jeddah, Saudi Arabia

P241 SERUM OSTEOPROTEGERIN AND BONE MINERAL DENSITY IN POSTMENOPAUSAL WOMEN WITH OR WITHOUT OSTEOPOROSIS

M. S. Ardawi*¹, H. A. Nasrat², T. M. Bahksh³, A. A. Maimany⁴, A. Y. Syamik⁵

¹Clinical Biochemistry, ²Obstetrics and Gynecology, ³Surgery, ⁴Radiology, ⁵Physiology, Faculty of Medicine and King Abdulaziz University Hospital, Jeddah, Saudi Arabia

P242 OSTEOPROTEGERIN, RANKL, BIOCHEMICAL MARKERS OF BONE TURNOVER AND BONE MINERAL DENSITY IN PRE- AND POST-MENOPAUSAL SAUDI WOMEN

M. S. M. Ardawi*¹, H. A. N. Nasrat², T. M. Bahksh³, A. A. Maimany⁴, A. Y. Syamik⁵

¹Clinical Biochemistry, Faculty of Medicine and King Abdulaziz University Hospital, King Abdulaziz University, ²Obstetrics and Gynecology, Faculty of Medicine and King Abdulaziz University Hospital, King, ³Surgery, Faculty of Medicine and King Abdulaziz University Hospital, King A, ⁴Radiology, ⁵Physiology, Faculty of Medicine and King Abdulaziz University Hospital, King, Jeddah, Saudi Arabia

P243 BONE MINERAL DENSITY AND SERUM LIPIDS IN SAUDI POSTMENOPAUSAL WOMEN

M. S. Ardawi*¹, A. A. Rouzi²

¹Clinical Biochemistry, ²Obstetrics and Gynecology, Faculty of Medicine and King Abdulaziz University Hospital, Jeddah, Saudi Arabia

P244 EFFECT OF ISOTRETINOIN THERAPY FOR ACNE VULGARIS ON BONE MINERAL METABOLISM

N. Arinci Incel*¹, A. Cordan Yazici², D. Ustunsoy², G. Ikizoglu², B. Tasdelen³

¹Physical Medicine and Rehabilitation, ²Dermatology, ³Biostatistics, Mersin University, Mersin, Turkey

P245 POSTMENOPAUSAL OSTEOPOROTIC WOMEN RISK FACTORS AND TREATMENT COMPLIANCE : OSTEPI STUDY

F. Blotman*¹, B. Avouac², B. Cortet³, P. Hilliquin⁴, D. Pouchain⁵, F. Allaert⁶, A. Gaudin⁷, A. El Hasnaoui⁷

¹Rheumatology, CHU Montpellier, Montpellier, ²Rheumatology, OFOS association, Paris, ³Rheumatology, CHRU Hôpital Roger Salengro, Lille, ⁴Rheumatology, CHU Sud Francilien, Corbeil Essonn, ⁵Rheumatology, GP, Vincennes, ⁶Medical Information Service, CHU de Dijon, Dijon, ⁷Health Economy, GlaxoSmithKlein laboratories, Marly-le-Roy, France

P246 DEGREE OF MINERALIZATION AND MICROHARDNESS OF BONE TISSUE IN CONTROL AND OSTEOPOROTIC MEN

G. Boivin*¹, Y. Bala¹, C. Simi¹, L. Ste-Marie², P. J. Meunier¹

¹INSERM Unité 403, Faculté de Médecine R. Laennec, Lyon, France, ²Centre de Recherche du CHUM, Hôpital Saint Luc, Montréal, Canada

P247 ROLE OF 11- β -HYDROXYSTEROID DEHYDROGENASE TYPE 1 IN THE OSTEOGENIC AND ADIPOGENIC DIFFERENTIATION OF PRIMARY HUMAN OSTEOBLASTS (PHOB) AND HUMAN OSTEOSARCOMA CELLS (HOS58)

P. Braun*¹, V. Ritz¹, M. Hüfner¹, H. Siggelkow¹

¹Gastroenterology and Endocrinology, University of Goettingen, Göttingen, Germany

P248 ZINC SUPPLEMENTATION CAN PROTECT FROM CADMIUM-INDUCED WEAKENING IN THE FEMORAL NECK FRACTURE STRENGTH IN RATS

M. M. Brzoska*¹, A. Roszczenko¹, M. Galazyn-Sidorczuk¹, K. Majewska², E. Kulikowska-Karpinska¹, J. Moniuszko-Jakoniuk¹

¹Department of Toxicology, Medical University of Bialystok, Bialystok, ²Faculty of Food Science, University of Warmia and Mazury in Olsztyn, Olsztyn, Poland

P249 THE EFFECT OF ZINC SUPPLEMENTATION ON CADMIUM ACCUMULATION AND ZINC CONTENT IN THE FEMUR OF RATS EXPOSED TO CADMIUM

M. M. Brzoska*¹, M. Galazyn-Sidorczuk¹, J. Rogalska¹, M. Jurczuk¹, J. Moniuszko-Jakoniuk¹
¹*Department of Toxicology, Medical University of Bialystok, Bialystok, Poland*

P250 INFLUENCE OF CYP 17 AND ESTROGEN RECEPTOR GENE POLYMORPHISMS ON BONE MINERAL DENSITY AND BONE TURNOVER IN ADULT THALASSAEMIC PATIENTS

S. Bucchieri*¹, N. Napoli², F. Giordano², D. Bruno², F. De Nicola², C. Lo Pinto³, R. Malizia³, M. Capra⁴, P. Rigano⁵, G. Rini², G. Di Fedè⁶
¹*Internal Medicine, ²Department of Internal Medicine, University of Palermo, ³Pediatric Hematology, Villa Sofia Hospital, ⁴Pediatric Hematology, Children's Hospital, ⁵Pediatric Hematology, "V. Cervello" Hospital, ⁶Department of Oncology, University of Palermo, Palermo, Italy*

P251 REGULATION OF CRYSTALLINITY IN HIP FRACTURE: AN INITIAL STUDY WITH FTIR

A. Caballero-Alias*¹, D. Faibish², N. Loveridge¹, S. K. Kaptoge¹, A. Lyon¹, J. Reeve¹, A. L. Boskey²
¹*Medicine, University of Cambridge, Cambridge, United Kingdom, ²Mineralised Tissue Laboratory, Hospital for Special Surgery, New York, NY, United States*

P252 THE INFLUENCE OF LIFE-STYLE AND SECONDARY CAUSES OF OSTEOPOROSIS IN DOBRUGEA REGION IN ROMANIA

E. G. Circo*¹, S. E. Circo¹, I. S. Chirca¹
¹*Endocrinology, Ovidius University of Constanta, Constanta, Romania*

P253 MALE IDIOPATHIC OSTEOPOROSIS. ILLIAC BONE BIOPSY STUDY BY MICRO-TC

M. Ciria*¹, J. Blanch¹, L. Perez-Edo¹, M. Mariñoso², D. Chappard³, S. Serrano², A. Diez-Perez⁴, J. Carbonell¹
¹*Rheumatology, ²Pathology, Institut Municipal d'Asist, Barcelona, Spain, ³Rheumatology, University of Angers, Angers, France, ⁴Internal Medicine, Institut Municipal d'Asist, Barcelona, Spain*

P254 PARATHYROID HORMONE (1-84) IS EFFECTIVE IN PATIENTS WITH A WIDE RANGE OF CLINICAL RISK FACTORS

J. Compston*¹, S. Silverman², A. Mathisen³, W. Gallwitz³, S. Morris³
¹*Cambridge School of Clinical Medicine, University of Cambridge, Cambridge, United Kingdom, ²Cedars Sinai Medical Center, David Geffen School of Medicine UCLA, Beverly Hills, ³Nycomed Group, Nps Pharmaceuticals, Salt Lake City, United States*

P255 VALUES OF 25-HYDROXYVITAMIN D (25-OH D3) IN VENEZUELAN MEN WITH LOW BONE MINERAL DENSITY

R. Constantino*¹, J. Ramos¹, J. Cedeno-Taborda¹, L. Marcano¹, E. Belzares¹, G. S. Riera-Espinoza¹
¹*UNILIME UC, Hospital Universitario Angel Larralde. Universidad de Carabobo, Valencia, Venezuela*

P256 GONADAL HORMONES LEVEL, SEXUAL HORMONE BINDING GLOBULIN LEVEL AND GONADOTROPIN LEVEL IN VENEZUELAN MEN WITH LOW BONE MINERAL DENSITY

R. Constantino*¹, J. Cedeno-Taborda¹, L. Marcano¹, J. Ramos¹, G. S. Riera-Espinoza¹
¹*UNILIME UC, Hospital Universitario Angel Larralde. Universidad de Carabobo, Valencia, Venezuela*

P257 THE RELATIONSHIP OF SODIUM AND CALCIUM INTAKE WITH BONE MASS IN POSTMENOPAUSAL WOMEN

S. Cvijetic*¹, M. Blanus², I. Colic Baric³, J. Ilich⁴
¹*Center for Osteoporosis, Institute for Medical Research and Occupational Health, ²Department for Mineral Metabolism, Institute for Medical research and Occupational Health, ³Faculty of Food Technology and Biotechnology, University of Zagreb, Zagreb, Croatia, ⁴School of Allied Health, University of Connecticut, Storrs, United States*

P258 DOES URINARY INCONTINENCE INCREASE THE RISK OF FALLS IN COMMUNITY DWELLING WOMEN?

Y. Dionyssiotis*¹, G. Trovas¹, A. Galanos¹, E. Papakitsou¹, S. Tournis¹, A. Katsalira¹, D. Economopoulos¹, B. Samdanis¹, G. P. Lyritis¹

¹Laboratory for Research Musculoskeletal System, University of Athens, KAT Hospital, Kifissia, Greece

P259 CHANGES OF BONE MINERAL DENSITY IN POSTMENOPAUSAL WOMEN WITH SUBCLINICAL THYROID HORMONE EXCESS

I. M. Duncea*¹, C. E. Georgescu²

¹Clinic of Endocrinology, University of Medicine and Pharmacy Cluj-Napoca, ²Clinic of Endocrinology, University of Medicine and Pharmacy, Cluj-Napoca, Romania

P260 THE RELATIONSHIP OF HORMONAL STATUS WITH CALCANEAL STIFFNESS INDEX IN TURKISH WOMEN

B. Durmaz*¹, S. Oncel², Y. Kirazli², S. Alper², O. Peker², M. Saridogan², Y. Kutsal², G. Dýncer², F. Atalay², N. Eskiurt²

¹Physical Therapy and Rehabilitation, Ege University Faculty of Medicine, ²Physical Therapy and Rehabilitation, Turkish Osteoporosis Society, Izmir, Turkey

P261 SERUM GLUTATHIONE PEROXIDASE ACTIVITY IS A MARKER FOR SEVERE OSTEOPOROSIS

R. Ebert*¹, C. Becker¹, L. Seefried¹, S. Göbel¹, D. Schneider¹, F. Jakob¹

¹Orthopedic Center for Muskuloskeletal Research, University of Wuerzburg, Wuerzburg, Germany

P262 QUANTITATIVE BACKSCATTERED ELECTRON IMAGING OF NORMAL AND OSTEOPOROTIC FEMORAL BONE

P. Sutton-Smith¹, H. Bread¹, **N. L. Fazzalari***¹

¹Division of Tissue Pathology, Institute of Medical and Veterinary Science, Adelaide, Australia

P263 A NO OBSERVABLE CARCINOGENIC EFFECT DOSE LEVEL IDENTIFIED IN FISCHER 344 RATS FOLLOWING DAILY TREATMENT WITH PTH(1-84) FOR 2 YEARS: ROLE OF THE C-TERMINAL PTH RECEPTOR?

J. Fox*¹, S. Smith², J. Jolette³, T. B. Marriott¹, C. E. Wilker¹

¹Nycomed Group, NPS Pharmaceuticals, Salt Lake City, United States, ²Bone Research, Charles River Laboratories Montreal, ³Bone Research, Charles River Laboratories Montreal, Quebec, Canada

P264 PTH 1-84 MORE EFFECTIVELY INDUCES JAGGED-1 MRNA THAN DOES PTH 1-34 IN UMR 106-01 OSTEOBLASTIC CELLS

J. Fox*¹, A. T. Pearman¹, B. L. Baker¹, N. E. Lloyd¹

¹Nycomed Group, NPS Pharmaceuticals, Salt Lake City, United States

P265 BODY MASS AND SERUM ESTRADIOL CORRELATE WITH PEAK BONE MASS IN HEALTHY MEN - RESULTS FROM THE ODENSE ANDROGEN STUDY

L. Frederiksen*¹, T. L. Nielsen¹, K. Wraae¹, C. Hagen¹, M. Andersen¹, K. Brixen¹

¹Endocrinology, Odense University Hospital, Odense, Denmark

P266 DISCORDANCE OF LONGITUDINAL CHANGES IN BONE MINERAL DENSITY BETWEEN DPX-L AND PRODIGY DENSITOMETERS

S. A. Frost*¹, J. A. Eisman¹, J. R. Center¹, T. V. Nguyen¹

¹Bone and Mineral Research Program, Garvan Institute of Medical Research, Sydney, Australia

P267 DAY TO DAY VARIABILITY IN CIRCULATING OSTEOCLAST PRECURSOR POPULATIONS IN POSTMENOPAUSAL WOMEN; IMPLICATIONS FOR USE IN CLINICAL STUDIES

S. J. Glover*¹, R. Eastell¹, A. Rogers¹

¹Academic Unit of Bone Metabolism, University of Sheffield, Sheffield, United Kingdom

P268 THE EFFECT OF THE 704 DELETION POLYMORPHISM IN THE RIZ1 GENE ON PERIMENOPAUSAL BONE MASS AND FRACTURE RISK

N. Gonzalez-Bofill*¹, L. B. Husted², C. Tofteng³, B. Abrahamsen⁴, P. Eiken⁵, P. Vestergaard¹, B. L. Langdahl²

¹Osteoporosis Clinic, ²Endocrinology and Metabolism, Aarhus Sygehus, Aarhus C, ³Endocrinology and Metabolism, Hvidovre Hospital, Hvidovre, ⁴Endocrinology, RASK, Køge, ⁵Endocrinology, Hillerød Centralsygehus, Hillerød, Denmark

P269 RISK FACTORS FOR FRACTURE IN CHILDREN AND ADOLESCENTS WITH REPEATED FOREARM FRACTURES

A. Goulding*¹

¹Medical and Surgical Sciences, University of Otago, Dunedin, New Zealand

P270 POLYMORPHISMS IN THE IL6R GENE ARE ASSOCIATED WITH BONE MINERAL DENSITY AND BODY MASS INDEX IN POSTMENOPAUSAL SPANISH WOMEN

M. Bustamante¹, A. Enjuanes², X. Nogues², L. Mellibovsky², A. Diez-Perez², **D. Grinberg***¹, S. Balcells¹

¹Genetics, Universitat de Barcelona, ²URFOA, Hospital del Mar-IMIM, Barcelona, Spain

P271 REGIONAL ASSESSMENT OF OSTEOPOROSIS KNOWLEDGE AND RISK FACTORS IN MEN

I. V. Haller*¹, A. M. Fernandez², C. M. Renier¹, J. A. Palcher¹

¹Education and Research, ²Rheumatology, St Mary's Duluth Clinic Health System, Duluth, United States

P272 AGE-RELATED LOSS OF MUSCLE MASS AND BMD IN THE C57BL/6 MOUSE

M. W. Hamrick*¹, C. Pennington¹, H. Jones¹, K. Ding², P. McNeil¹, C. M. Isales²

¹Cellular Biology and Anatomy, ²Institute of Molecular Medicine and Genetics, Medical College of Georgia, Augusta, United States

P273 INVESTIGATION OF THE ASSOCIATION OF HAPLOTYPES IN THE TRANSFORMING GROWTH FACTOR-[BETA]-INDUCIBLE EARLY GROWTH RESPONSE 2 GENE WITH VARIATION IN BONE MINERAL DENSITY

K. G. Hegarty*¹, F. J. Drummond¹, M. Daly¹, F. Shanahan², M. G. Molloy³

¹Department of Medicine, ²Alimentary Pharmabiotic Center, ³Department of Rheumatology and Sports Medicine, National University of Ireland, Cork, Ireland

P274 ASSOCIATION OF THE PARATHYROID HORMONE RECEPTOR TYPE 1 INTRON 1 (T/C) POLYMORPHISM WITH ANNUALISED PERCENTAGE RATE OF CHANGE IN LUMBAR SPINE BONE MINERAL DENSITY

K. G. Hegarty*¹, F. J. Drummond¹, M. Daly¹, F. Shanahan², M. G. Molloy³

¹Department of Medicine, ²Alimentary Pharmabiotic Center, ³Department of Rheumatology and Sports Medicine, National University of Ireland, Cork, Ireland

P275 FACTORS ASSOCIATED WITH OCCURRENCE OF OSTEOPOROTIC FRACTURE IN POST-MENOPAUSAL WOMEN WITH OSTEOPOROSIS: OSTEPI STUDY

P. Hilliquin*¹, B. Avouac², F. Blotman³, B. Cortet⁴, D. Pouchain⁵, A. Gaudin⁶, A. El Hasnaoui⁶

¹Rhumatologie, Sud Francilien Hospital, Corbeil Essonne, ²Rhumatologie, OFOS association, Paris, ³Rhumatologie, CHU Montpellier, Montpellier, ⁴Rhumatologie, CHRU Hôpital Roger Salengro, Lille, ⁵Rhumatologie, Cabinet Généraliste, Vincennes, ⁶Economie de la Santé, GlaxoSmithKlein Laboratories, Marly-le-Roy, France

P276 PREVALENCE OF OSTEOPOROSIS IN ELDERLY DANISH MEN - RESULTS FROM THE ODENSE ANDROGEN STUDY

M. Højberg*¹, K. Wraae¹, T. L. Nielsen¹, C. Hagen¹, M. Andersen¹, K. Brixen¹

¹Endocrinology, Odense University Hospital, Odense, Denmark

P277 POLYMORPHISMS IN THE VITAMIN D RECEPTOR GENE, BONE MINERAL DENSITY AND FRACTURES IN POLISH PATIENTS

W. Horst-Sikorska*¹, R. Kalak¹, A. Wawrzyniak¹, M. Marcinkowska¹, L. Celczyńska-Bajew¹, R. Slomski¹

¹Department of Family Medicine, Department of Biochemistry and Biotechnology, University of Medical Sciences, Agricultural University, Poznan, Poland

P278 THE P704 DELETION POLYMORPHISM IN THE RIZ1 GENE IS NOT GENERALLY ASSOCIATED WITH BONE MASS OR RISK OF OSTEOPOROTIC FRACTURES, BUT IS ASSOCIATED WITH FRACTURE RISK THROUGH INTERACTION WITH AN ERALPHA POLYMORPHISM

L. B. Husted*¹, L. Stenkjær², M. Carstens², B. L. Langdahl²

¹Department of Endocrinology, Aarhus Sygehus, Aarhus C, ²Department of Endocrinology, Aarhus Sygehus, Århus C, Denmark

P279 RETROVIRUS-MEDIATED GENE TRANSFER OF RANK-FC AMELIORATES BONE RESORPTION IN OVARECTOMIZED MICE

I. Jeong*¹, . D. Kim², . S. Her¹, . S. Cho¹, . S. Kim¹, . S. Kim¹, . C. S. Shin¹

¹Internal medicine, Seoul National University College of Medicine, Seoul, ²Internal medicine, DanKook University College of Medicine, Cheon-An, South Korea

P280 OSTEOPOROSIS CARE GAPS AMONG NURSING HOME RESIDENTS IN CANADA

D. L. Kendler*¹, L. Dian¹, W. Li¹, L. Manness²

¹Medicine, University of British Columbia, Vancouver, ²Medicine, Merck Frosst Canada, Pointe-Claire, Canada

P281 RISK FACTORS FOR OSTEOPOROSIS IN URBAN IRANIAN POSTMENOPAUSAL WOMEN-A CENTER BASED STUDY

A. Keramat*¹, B. Larijani², A. Chopra³, B. Patwardhan⁴, H. Adibi⁵, A. Hossainnezhad²

¹School of health sciences, University of Pune-India, ²Endocrinology and Metabolism Research center, Shariati Hospital, Tehran, Iran (Islamic Republic of), ³Center of Rheumatoid diseases, Center of Rheumatoid Diseases, ⁴School of health sciences, University of Pune, Pune, India, ⁵Center of Rheumatoid diseases, Shariati Hospital, Tehran, Iran (Islamic Republic of)

P282 BONE MINERAL DENSITY IN PREMENOPAUSAL FEMALES WITH NEWLY DIAGNOSED GRAVES' DISEASE

T. Kocjan*¹, K. Zaletel², S. Gaberscek², S. Hojker², J. Prezelj¹

¹Dept. of Endocrinology, ²Dept. for Nuclear Medicine, University Medical Centre Ljubljana, Ljubljana, Slovenia

P283 RISK FACTORS FOR VITAMIN D INADEQUACY AMONG WOMEN WITH OSTEOPOROSIS: AN INTERNATIONAL STUDY

R. Rizzoli¹, J. Eisman², O. Ljunggren³, **J. Chandler***⁴, J. Norquist⁴, G. Krishnarajah⁴, S. Lim⁵

¹, Hospital Cantonal Universitaire de Geneve, Geneve, Switzerland, ², Garvan Institute of Medical Research, Sydney, Australia, ³Department of Medical Sciences, University Hospital, Uppsala, Sweden, ⁴Epidemiology, Merck Research Laboratories, Blue Bell, United States, ⁵, Severance Hospital Department of Internal Medicine, Seoul, South Korea

P284 PVUII AND XBAl POLYMORPHISMS OF ESr1 GENE AND BODY HEIGHT IN ADULT MEN AND WOMEN IN POLISH POPULATION - THE EPOLOS STUDY

M. Kruk*¹, M. Jaworski¹, J. Lukaszkiwicz², E. Karczmarewicz¹, P. Bilinski³, E. Czerwinski⁴, A. Lewinski⁵, E. Marcinowska-Suchowierska⁶, A. Milewicz⁷, M. Spaczynski⁸, A. G. Uitterlinden⁹, R. S. Lorenc¹

¹Dept. of Biochemistry and Experimental Medicine, The Children's Memorial Health Institute, ²Dept. of Biochemistry, University of Medicine, Pharmaceutical Faculty, Warsaw, ³Orthopaedic and Traumatology Clinic, The Ludwig Rydygier University of Medicine, Bydgoszcz, ⁴Dept. of Orthopaedics, Jagiellonian University, Krakow, ⁵Dept. of Thyroidology, Clinical Hospital No3, Lodz, ⁶Dept. of Internal Medicine, Postgraduate Medical Education Centre, Orłowski Hospital, Warsaw, ⁷Dept. and Clinic of Endocrinology and Diabetology, University of Medicine, Wrocław, ⁸Dept. of

Gynecology and Obstetrics, Karol Marcinkowski University of Medical Sciences, Poznan, Poland,
⁹Dept. of Internal Medicine, Erasmus University, Rotterdam, Netherlands

P285 DISORDERS IN BONE METABOLISM IN MALE RATS AT MODERATE CHRONIC EXPOSURE TO CADMIUM

E. Kulikowska-Karpinska*¹, J. Rogalska¹, M. Jurczuk¹, M. M. Brzoska¹, A. Roszczenko¹, M. Galazyn-Sidorczuk¹, J. Moniuszko-Jakoniuk¹

¹Department of Toxicology, Medical University of Bialystok, Bialystok, Poland

P286 BONE MINERAL DENSITY IN LUMBAR SPINE AND FEMUR IN A RURAL POPULATION IN GREECE. AN EPIDEMIOLOGICAL STUDY IN THE ATHENS METROPOLITAN AREA, GREECE

I. N. Legakis*¹, V. Papadopoulos², V. Tataridas², K. Strigaris²

¹Endocrinology, ²Radiology, Henry Dunant Hospital, Athens, Greece

P287 VITAMIN D STATUS IN FRENCH POSTMENOPAUSAL WOMEN WITH DENSITOMETRIC OSTEOPOROSIS

F. E. Levy-weil*¹, D. Khalfon², L. Chauvelot-Moachon³, J. C. Souberbielle⁴, S. Djennane¹, J. L. Feldmann¹

¹Department of Rheumatology, ²Biochemistry Laboratory, Centre Hospitalier Victor Dupouy, Argenteuil, ³Center of Pharmacovigilance, Hopital Cochin, ⁴Physiology Laboratory, Hopital Necker, Paris, France

P288 VITAMIN D STATUS AND THE THRESHOLD FOR THE INCREASE OF SERUM PTH IN ADULT MEN FROM DIFFERENT EUROPEAN COUNTRIES: THE NEMO STUDY

P. Lips*¹, N. M. Van Schoor², P. Szulc³, J. M. Kaufman⁴, S. Gonnelli⁵, J. Stepan⁶, S. Boonen⁷, M. T. E. Puts², M. A. Blankenstein⁸

¹Endocrinology, ²EMGO, VU University Medical Center, Amsterdam, Netherlands, ³INSERM, Claude Bernard University, Lyon, France, ⁴Endocrinology, Ghent University, Ghent, Belgium, ⁵Endocrinology, University of Siena, Siena, Italy, ⁶Internal Medicine, University of Prague, Prague, Czech Republic, ⁷Geriatrics, Leuven University, Leuven, Belgium, ⁸Clinical Chemistry, VU University Medical Center, Amsterdam, Netherlands

P289 SHWACHMAN-DIAMOND SYNDROME IS ASSOCIATED WITH OSTEOPOROSIS

S. Toiviainen-Salo¹, M. Mäyränpää¹, P. Durie², L. Ellis², J. Rommens², E. Savilahti¹, **O. Mäkitie***¹

¹Metabolic Bone Clinic, Hospital for Children and Adolescents, Helsinki University Hospital, Helsinki, Finland, ²Hospital for Sick Children, University of Toronto, Toronto, Canada

P290 COMPARISON OF MANDIBULAR AND PROXIMAL TIBIA SITES IN THE RAT: SELECTIVE SENSITIVITY TO OVARECTOMY AND PROTEIN UNDERNUTRITION

A. Mavropoulos¹, R. Rizzoli¹, **P. Ammann***¹

¹Division of Bone Diseases, Department of Rehabilitation and Geriatrics, Geneva University Hospital, Geneva, Switzerland

P291 EFFECT OF CIGARETTE SMOKING ON BONE DENSITY

S. Meszaros*¹, E. Toth², E. Hosszu³, V. Ferencz¹, M. Deli¹, E. Csupor⁴, C. Horvath¹

¹1st Department of Internal Medicine, Semmelweis University, Budapest, ²Department of Reumatology, Ferenc Flor County Hospital, Kerepestarcsa, ³2nd Department of Pediatrics, Semmelweis University, ⁴The Health Service, Budavar Local Authorities, Budapest, Hungary

P292 RELATIONSHIP BETWEEN ANTHROPOMETRICS VARIABLES WITH BONE MINERAL CONTENT (BMC) IN AN URBAN POPULATION.

A. L. Misiunas*¹, M. Hevia², N. Rella², M. G. Loto², C. J. Herrera², M. V. Moran², G. Roccatagliata², G. Rovira², M. I. Curria², C. Fitzsimons³, N. Llacer⁴, C. Baistrocchi⁴, C. Almeida³, C. Pereyra³, A. Casares³, D. Martino³

¹Endocrinology, Hospital Británico de Buenos Aires, ²Endocrinology, ³Nuclear Medicine, ⁴Gynecology, Hospital Británico de Buenos Aires, Buenos Aires, Argentina

P293 ASSOCIATION OF ESTROGEN RECEPTOR ALPHA GENE POLYMORPHISMS WITH BONE MINERAL DENSITY: STUDY IN POSTMENOPAUSAL WOMEN OF DIFFERENT ETHNICITIES

S. Mitra*¹, M. Desai¹, I. Khatkhatay¹

¹*Molecular Immuno Diagnostic, National Institute for Research in Reproductive Health, Mumbai, India*

P294 LEPTIN AS RISK FACTOR OF OSTEOPOROSIS

M. M. J. Montoya Garcia*¹, E. E. Oncala Sibajas¹, M. M. Giner Garcia¹, M. M. A. Vazquez Gamez¹, M. M. J. Miranda Garcia¹, R. R. Moruno Garcia¹, M. M. J. Gómez de Tejada Romero¹, J. J. L. Grier Borras¹, R. R. Perez Temprano¹, R. R. Perez Cano¹

¹*Osteoporosis Unit, University Hospital Virgen Macarena, Seville, Spain*

P295 RELATIONSHIP OF HOMOCYSTEINE, VITAMIN B12 AND FOLATE TO OSTEOPOROTIC FRACTURES

M. M. J. Montoya Garcia*¹, M. M. C. Merino Rumín¹, M. M. J. Miranda Garcia¹, M. M. A. Vazquez Gamez¹, R. R. Moruno Garcia¹, M. M. Giner Garcia¹, M. M. J. Gomez de Tejada Romero¹, R. R. Perez Temprano¹, R. R. Perez Cano¹

¹*Osteoporosis Unit, University Hospital Virgen Macarena, Seville, Spain*

P296 ANALYSIS OF POLYMORPHISMS OF THE COL1A1 AND VDR GENES IN SEVERE ASTHMA PATIENTS TREATED WITH ORAL GLUCOCORTICOIDS

M. V. Moskalenko*¹, A. M. Putilin², I. A. Baranova³, M. V. Aseev¹, G. S. Demin¹, D. Gorab¹, N. V. Demin⁴, A. G. Chuchalin², V. S. Baranov¹

¹*Lab for Prenatal Diagnostics, Otts Institute of Obstetrics and Gynecology RAMS, St.-Petersburg,*

²*Pulmology department, Pulmonology Research Institute,* ³*Allergy department, Russian State Medical University,* ⁴*Rheumatological department, Institute of Rheumatology, Moscow, Russian Federation*

P297 THE ROLE OF OBESITY IN THE IMPACT OF MENOPAUSE ON BONE MINERAL DENSITY

A. Mylonakis*¹, I. I. Androulakis¹, M. Peppas¹, A. Papaefstathiou¹, D. Hadjidakis¹, S. A. Raptis¹

¹*2nd Department of Internal Medicine-Propaedeutic, Research Institute, Attikon and Evgenidion University Hospitals, Athens University, Athens, Greece*

P298 CHROMOSOME13 LOCUS FOR PEAK FEMORAL BONE MINERAL DENSITY MODULATES BONE FORMATION IN MICE

R. Nakanishi*¹, M. Shimizu², M. Mori³, B. Otsuki¹, S. Okudaira⁴, K. Higuchi³, T. Nakamura¹, T. Tsuboyama⁵

¹*Orthopedic surgery, Graduate school of medicine, Kyoto University,* ²*Department of Rehabilitation, Utano National Hospital, Kyoto,* ³*Department of aging biology, Institute on Aging and Adaptation, Shinsyu University Graduate School of Medicine, Matsumoto,* ⁴*Orthopedic Surgery, Kyoto City Hospital,* ⁵*School of Health Sciences, Faculty of Medicine, Kyoto University, Kyoto, Japan*

P299 RELATION BETWEEN OSTEOID THICKNESS AND SERUM 25-HYDROXYVITAMIN D IN AMBULANT PATIENTS

A. G. Need*¹, R. J. Moore², H. A. Morris³, M. Horowitz⁴, C. Nordin¹

¹*Clinical Biochemistry,* ²*Tissue Pathology, Institute of Medical and Veterinary Science,* ³*Bone Research, Hanson Centre,* ⁴*Medicine, Royal Adelaide Hospital, Adelaide, Australia*

P300 HIP AXIS LENGTH PREDICTS BONE STRENGTH IN THE PROXIMAL FEMUR INDEPENDENT OF BMD - A HUMAN AUTOPSY STUDY

N. Nissen*¹, E. Hauge², F. Melsen², B. Abrahamsen³, K. Brixen¹, J. Jensen⁴

¹*Endocrinology, University of Southern Denmark, Odense University Hospital, Odense,*

²*Rheumatology, Aarhus Sygehus, Aarhus University Hospital, Aarhus,* ³*Endocrinology, Roskilde Amt Sygehus, Koge,* ⁴*Endocrinology, Hvidovre University Hospital, Hvidovre, Denmark*

P301 ADULT-TYPE HYPOLACTASIA AND CALCIUM BALANCE: DECREASED CALCIUM INTAKE OR IMPAIRED CALCIUM ABSORPTION?

B. M. Obermayer-Pietsch*¹, M. Gugatschka¹, S. Reitter¹, W. Plank¹, A. Strele², D. Walter¹, C. M. Bonelli¹, W. Goessler³, H. Dobnig¹, C. Hogenauer¹, A. Fahrleitner-Pammer¹, W. Renner⁴

¹Internal Medicine, Medical University Graz, ²Unit of Biostatistics, Center for Medical Research, ³Institute of Chemistry-Analytical Chemistry, Karl-Franzens-University, ⁴Clinical Institute of Medical and Chemical Laboratory Diagnostics, Medical University Graz, Graz, Austria

P302 AGE-RELATED CHANGES IN VITAMIN K-DEPENDENT GAMMA-GLUTAMYL CARBOXYLASE ACTIVITY AND RNA EXPRESSION IN FETUS, NEONATE, YOUNG AND ADULT MICE

T. Okano*¹, K. Nakagawa¹, Y. Hirota¹

¹Department of Hygienic Sciences, Kobe Pharmaceutical University, Kobe, Japan

P303 PREVALENCE OF FRAGILITY FRACTURE IN WOMEN AND MEN WITH OSTEOPOROSIS, OSTEOPENIA AND NORMAL BONE MINERAL DENSITY (BMD): THE CANADIAN MULTICENTRE OSTEOPOROSIS STUDY (CAMOS)

A. Papaioannou*¹, G. Ioannidis¹, A. Tenenhouse², Y. Gao³, C. Berger³, J. C. Prior⁴, S. M. Kaiser⁵, D. A. Hanley⁶, J. P. Brown⁷, W. P. Olszynski⁸, T. M. Murray⁹, T. Anastassiades¹⁰, S. Kirkland¹¹, C. Joyce¹², S. Poliquin¹³, N. Kreiger¹⁴, S. Davison⁸, C. C. Kennedy¹, K. Siminoski¹⁵, W. D. Leslie¹⁶, A. Cranney¹⁷, D. Goltzman², J. D. Adachi¹

¹Medicine, McMaster University, Hamilton, ²Medicine, ³CaMos Analysis Centre, McGill University, Montreal, ⁴Medicine, Endocrinology, University of British Columbia, Vancouver, ⁵Medicine, Dalhousie University, Halifax, ⁶Medicine, University of Calgary, Calgary, ⁷Medicine, Laval University, Ste-Foy, ⁸Medicine, University of Saskatchewan, Saskatoon, ⁹Medicine, University of Toronto, Toronto, ¹⁰Medicine, Division of Rheumatology, Queen's University, Kingston, ¹¹Community Health and Epidemiology, Dalhousie University, Halifax, ¹²Medicine, Memorial University, St. John's, ¹³CaMos National Coordinating Centre, McGill University, Montreal, ¹⁴Public Health Sciences, University of Toronto, Toronto, ¹⁵Radiology and Diagnostic Imaging, University of Alberta, Edmonton, ¹⁶Medicine, University of Manitoba, Winnipeg, ¹⁷Medicine, University of Ottawa, Ottawa, Canada

P304 ASSESSMENT OF THE INCIDENCE OF SECONDARY HYPERPARATHYROIDISM IN A GROUP OF 'HEALTHY' POST-MENOPAUSAL WOMEN SUFFERING FROM PRIMARY KNEE OSTEOARTHRITIS

K. A. Papavasiliou*¹, J. M. Kirkos¹, R. Zilidou², A. Pavlitou², C. Dimitriou³, G. A. Kapetanos¹

¹3rd Orthopaedic department, Aristotle University of Thessaloniki, ²Laboratory of Immune-Chemistry, "Papageorgiou" General Hospital, ³Orthopaedic Department, "Hippokrateion" General Hospital, Thessaloniki, Greece

P305 THE IMPACT OF TOTAL KNEE REPLACEMENT ON INTACT-PTH LEVEL IN 'HEALTHY' POSTMENOPAUSAL WOMEN SUFFERING FROM PRIMARY OSTEOARTHRITIS OF THE KNEE

K. A. Papavasiliou*¹, J. M. Kirkos¹, M. Potoupnis¹, I. Sarris¹, F. Sayegh¹, C. Dimitriou², G. A. Kapetanos¹

¹3rd Orthopaedic department, Aristotle University of Thessaloniki, ²Orthopaedic Department, "Hippokrateion" General Hospital, Thessaloniki, Greece

P306 INFLUENCE OF PHYSICAL ACTIVITY ON BONE STRENGTH

L. Pedrotti*¹, R. Mora¹, B. Bertani¹, G. Tuvo¹, I. Crivellari¹, G. B. Galli¹, S. Quaglini²

¹Department of Orthopaedics and Traumatology, University of Pavia, Institute Città di Pavia, ²Department of Computer Science and Systems, University of Pavia, Pavia, Italy

P307 IGF-I, IGF BINDING PROTEINS-1 AND -3 AND THEIR CORRELATION WITH BONE MINERAL DENSITY IN CIRRHOTIC PATIENTS UNDERWENT LIVER TRANSPLANTATION: A LONGITUDINAL STUDY

J. M. Pego-Reigosa*¹, C. Millan-Cachinero², N. Martinez-Lopez de Castro³, I. Herrero-Santos⁴, M. J. Gil-Calvo⁵, V. Del Campo Pérez⁶, L. Campos-Vilarino⁷, J. A. Quiroga-Vila⁴

¹Rheumatology, Hospital do Meixoeiro, Vigo, ²Preventive Medicine and Epidemiology, Hospital Comarcal de Monforte, Lugo, ³Hospital Pharmacy, Hospital do Meixoeiro, Vigo, ⁴Internal Medicine,

⁵Biochemistry, Clinica Universitaria de Navarra, Pamplona, ⁶Preventive Medicine and Epidemiology, ⁷Nuclear Medicine, Hospital do Meixoeiro, Vigo, Spain

P308 OSTEOCYTE DENSITY FROM ILLIAC CANCELLOUS BONE BIOPSY IN MALES WITH IDIOPATIC OSTEOPOROSIS

L. Perez-Edo*¹, M. Ciria¹, M. Mariñoso², J. Blanch¹, D. Rotés-Sala¹, S. Serrano², A. Diez-Perez³, J. Carbonell¹

¹Rheumatology, ²Pathology, ³Internal Medicine, Institut Municipal d'Asist, Barcelona, Spain

P309 CORTICAL BONE MINERAL DENSITY INFLUENCED BY BODY MASS INDEX

J. Böttcher*¹, A. Pfeil¹, F. Teufel², G. Lehmann³, M. L. Schäfer¹, A. Petrovitch¹, A. Malich⁴, W. A. Kaiser¹, G. Hein³, G. Wolf¹

¹Friedrich-Schiller-University Jena, Institute of Diagnostic and Interventional Radiology, Jena, ²Krankenhaus Stollberg, Clinic of Diagnostic Radiology, Stollberg, ³Friedrich-Schiller-University Jena, Clinic of Internal Medicine III, Jena, ⁴Sued-Harz Klinikum, Department of Radiology, Nordhausen, Germany

P310 OSTEOPOROSIS IN MASTOCYTOSIS

N. M. Rabelink*¹, P. L. A. Van Daele¹, M. C. Zillikens¹, P. M. Van Hagen¹, J. A. M. Van Laar¹

¹Internal Medicine, Erasmus MC, Rotterdam, Netherlands

P311 REFERENCE VALUES OF 25-HYDROXYVITAMIN D (25-OH D3) IN PREMENOPAUSAL VENEZUELAN WOMEN WITH NORMAL BONE MINERAL DENSITY

J. Ramos*¹, G. S. Riera-Espinoza¹

¹UNILIME UC, Hospital Universitario Angel Larralde. Universidad de Carabobo, Valencia, Venezuela

P312 NO EFFECT OF VITAMIN K1 INTAKE ON BONE MINERAL DENSITY AND FRACTURE RISK IN PERIMENOPAUSAL WOMEN

L. Rejnmark*¹, P. Vestergaard¹, P. Charles², P. Hermann³, C. Brot⁴, P. Eiken⁵, L. Mosekilde²

¹The Osteoporosis Clinic, ²Dept. of Endocrinology and Metabolism C, University Hospital of Aarhus, Aarhus, ³2 Dept. of Endocrinology, Odense University Hospital, Odense, ⁴The Osteoporosis Research Centre, Hvidovre Hospital, Hvidovre, ⁵Dept. of Endocrinology and Clinical Physiology and Nuclear Medicine, Hilleroed Hospital, Hilleroed, Denmark

P313 OSTEOPOROSIS RISK FACTORS IN PATIENTS WITH ESTABLISHED AND SEVERE OSTEOPOROSIS; A MATCHED PAIRS ANALYSIS FROM THE OSSO SPANISH COHORT

M. Rentero*¹, E. Martin Mola², P. Aguado², A. Oteo³, J. Zubieta⁴

¹Research Center, Lilly, ²S. Reumatologia, H. La Paz, ³S. Traumatologia, H. Moratalaz, Madrid, ⁴S. Reumatologia, H. Toledo, Toledo, Spain

P314 THE INFLUENCE OF KLOTHO GENE ON FEMALE SKELETAL AGING

J. A. Riancho*¹, C. Valero¹, J. L. Hernandez¹, N. Peña², A. L. Zarrabeitia¹, C. Viadero², F. Ortiz¹, J. Gonzalez-Macias¹, M. T. Zarrabeitia³

¹Internal Medicine, Hospital UM Valdecilla, University Cantabria, ²Geriatrics, Centro Mayores Cueto, ³Legal Medicine, University Cantabria, Santander, Spain

P315 AGE, BUT NOT SEX, INFLUENCE AROMATASE GENE EXPRESSION BY HUMAN BONE CELLS

J. A. Riancho*¹, C. Sañudo¹, V. Mijares¹, M. Perez-Nuñez², M. A. Alonso²

¹Internal Medicine, ²Traumatology, Hospital UM Valdecilla, University Cantabria, Santander, Spain

P316 MICROSATELLITES OF SEX HORMONE RECEPTORS AND BONE MINERAL DENSITY

M. T. Zarrabeitia¹, J. L. Hernandez², C. Valero², J. Gonzalez-Macias², J. A. Amado³, **J. A. Riancho***²

¹Legal Medicine, University Cantabria, ²Internal Medicine, ³Endocrinology, Hospital UM Valdecilla, University Cantabria, Santander, Spain

P317 CLINICAL CHARACTERISTICS OF PATIENTS WITH FRAGILITY FRACTURES WITHIN OSTEOPENIC RANK

F. A. Riera¹, G. S. Riera-Espinoza*¹

¹UNILIME UC, Hospital Universitario Angel Larralde. Universidad de Carabobo, Valencia, Venezuela

P318 WITH WHAT BONE DENSITY DO MY PATIENTS FRACTURE? A LATIN AMERICAN CLINICAL EXPERIENCE

G. S. Riera-Espinoza*¹, F. A. Riera¹

¹UNILIME UC, Hospital Universitario Angel Larralde. Universidad de Carabobo, Valencia, Venezuela

P319 ALTERED BONE COLLAGEN/MINERAL NANO-COMPOSITE PROPERTIES IN FEMORAL NECK CORTICES OF OSTEOPOROTIC WOMEN

P. Roschger*¹, A. Gourrier², N. Fratzl-Zelman¹, M. Weber¹, N. Loveridge³, J. Reeve³, P. Fratzl², K. Klaushofer¹

¹Ludwig Boltzmann Inst. of Osteology at the Hanusch Hospital of WGKK and AUVA Trauma Centre Meidling, 4th Med. Dept. Hanusch Hospital, Vienna, Austria, ²Dept. of Biomaterials, Max Planck Institute of Colloids and Interfaces, Potsdam, Germany, ³Bone Research Group, MRC, University of Cambridge Clinical School, Cambridge, United Kingdom

P320 OSTEOPOROSIS

V. Ruci*¹, D. Ruci²

¹Department of Orthopaedics and Bone Diseases, ²Department of Rheumatology, Mother Teresa University Hospital Tirana, Albania., Tirana, Albania

P321 RISK FACTORS OF DEVELOPMENT OF OSTEOPENIA IN CHILDREN WITH BRONCHIAL ASTHMA

L. A. Scheplyagina*¹, T. Y. Moissejeva¹, I. V. Kruglova¹, V. A. Tomashevskaya¹

¹Laboratory of Osteoporosis, Research Center of Children Health, Russian Academy of Medical Sciences, Moscow, Russian Federation

P322 FREQUENCY AND DISTRIBUTION OF FEMORAL NECK FRACTURES IN FEMALES OVER 65 IN HUNGARY

A. Sebestyén¹, I. Boncz², I. Naumov*³, I. Ember⁴, J. Nyárády³

¹County Baranya Health Insurance Fund, National Health Insurance Fund Administration, Pécs, ²Department of Health Policy, National Health Insurance Fund Administration, Budapest, ³Department of Traumatology and Hand Surgery, ⁴Institute of Public Health and Preventive Medicine, University of Pécs, Pécs, Hungary

P323 EARLY MORTALITY RATE OF FEMORAL NECK FRACTURE IN FEMALES OVER 65 IN HUNGARY

A. Sebestyén¹, I. Boncz², I. Naumov*³, I. Ember⁴, J. Nyárády³

¹County Baranya Health Insurance Fund, National Health Insurance Fund Administration, Pécs, ²Department of Health Policy, National Health Insurance Fund Administration, Budapest, ³Department of Traumatology and Hand Surgery, ⁴Institute of Public Health and Preventive Medicine, University of Pécs, Pécs, Hungary

P324 RELATIONSHIP OF INFLAMMATORY CYTOKINES TO BONE MINERAL DENSITY AND CONTENT IN HEALTHY POSTMENOPAUSAL WOMEN

N. E. Silverman¹, E. Gertz², K. B. Hanson³, J. W. Stewart³, D. L. Alekel³, L. N. Hanson³, C. B. Stephensen², M. D. Van Loan²

¹Department of Nutrition, University of California at Davis, ²USDA, ARS, Western Human Nutrition Research Center, Davis, ³Department of Food Science and Human Nutrition, Iowa State University, Ames, United States

P325 POLYMORPHISM IN FARNESYL PYROPHOSPHATE-SYNTASE (FDPS) GENE AND RELATION WITH BONE MINERAL DENSITY AND RESPONSE TO AMINOBISFOSFONATE TREATMENT

S. Silvestri*¹, S. S. Carbonell¹, C. Christiansen², M. Brandi¹

¹Internal Medicine, University of Florence, Florence, Italy, ²CCBR, Center for Clinical and Basic Research, Ballerup, Denmark

P326 DETERMINATION OF BMD IN NORMAL POPULATION OF SHIRAZ

M. Taghavi¹

¹Endocrine Department, Mashhad Medical University, Mashhad, Iran (Islamic Republic of)

P327 IS THERE ANY RELATIONSHIP BETWEEN SERUM MG LEVELS AND OSTEOPOROSIS IN THE ELDERLY?

Z. Ulger*¹, M. Cankurtaran², M. Halil², B. Yavuz², T. Yildirim¹, S. Ariogul²

¹Internal Medicine, ²Internal Medicine, Division of Geriatric Medicine, Hacettepe University, Ankara, Turkey

P328 CONTRIBUTIONS OF BODY COMPONENTS TO BONE MASS IN YOUNG MEN AND WOMEN

C. Valero*¹, M. T. Zarrabeitia¹, J. L. Hernández¹, J. González Macías¹, J. A. Riancho¹

¹Departments of Internal Medicine and Legal Medicine, University of Cantabria, Santander, Spain

P329 A 7-YEAR FOLLOW-UP STUDY ON BONE METABOLISM IN CHILDREN AND ADOLESCENTS WITH TYPE 1 DIABETES MELLITUS

M. M. A. Vázquez Gámez*¹, J. J. a. Bermudez de la vega¹, R. R. Moruno garcia¹, M. M. j. Montoya garcia¹, M. M. Giner garcia¹, M. M. j. Miranda garcia¹, R. R. Perez temprano¹, R. R. Perez cano¹

¹Medicine. Osteoporosis Unit., University Hospital Virgen Macarena, Seville, Spain

P330 PROTON PUMP INHIBITORS, HISTAMINE H2 RECEPTOR ANTAGONISTS, AND OTHER ANTACID MEDICATIONS AND RISK OF FRACTURE

P. Vestergaard*¹, L. Rejnmark², L. Mosekilde²

¹The Osteoporosis Clinic, ²Department of Endocrinology and Metabolism C, Aarhus Amtssygehus, Aarhus, Denmark

P331 FRACTURE RISK ASSOCIATED WITH USE OF MORPHINE AND OPIATES

P. Vestergaard*¹, L. Rejnmark², L. Mosekilde²

¹The Osteoporosis Clinic, ²Department of Endocrinology and Metabolism C, Aarhus Amtssygehus, Aarhus, Denmark

P332 FRACTURE RISK ASSOCIATED WITH USE OF NON-STEROIDAL ANTI-INFLAMMATORY DRUGS (NSAID), ACETYLSALICYLIC ACID, AND ACETAMINOPHENE, AND THE INTERACTION WITH RHEUMATOID ARTHRITIS AND OSTEOARTHRITIS

P. Vestergaard*¹, L. Rejnmark², L. Mosekilde²

¹The Osteoporosis Clinic, ²Department of Endocrinology and Metabolism C, Aarhus Amtssygehus, Aarhus, Denmark

P333 A GENOMEWIDE LINKAGE SCAN IN A FAMILY WITH A HIGHLY PENETRANT FORM OF OSTEOPOROSIS

C. Vidal*¹, R. Galea², M. Brincat², A. Xuereb-Anastasi³

¹Department of Pathology, ²Department of Obstetrics and Gynaecology, ³Institute of Health Care, University of Malta, G'Mangia, Malta

P334 BMP-6 INCREASES BONE MINERAL DENSITY AND REDUCES GLYCEMIA IN OSTEOPENIC MICE

P. Simic*¹, J. Buljan Culej¹, I. Orlic¹, M. Zuvic², F. Borovecki¹, S. Vukicevic¹

¹Department of Anatomy, ²Department of Nuclear Medicine, School of Medicine, Zagreb, Croatia

P335 BIODISTRIBUTION AND IN VIVO EFFICACY OF SYSTEMICALLY ADMINISTERED AND FROM URINE PURIFIED SOLUBLE BMP-7/BMP-6 HYBRID MOLECULE IN RATS

L. Grgurevic*¹, S. Vukicevic¹

¹*Department of Anatomy, School of Medicine, Zagreb, Croatia*

P336 DIFFERENTIAL EFFECTS OF TWO PRO-APOPTOTIC MEMBERS OF THE BCL-2 GENE FAMILY ON MURINE BONE QUALITY

L. M. Wise*¹, A. Benito², G. Nunez², G. Perez³, J. Tilly³, A. Jurisicova¹, M. D. Grynepas¹

¹*Samuel Lunenfeld Research Institute, Mount Sinai Hospital and University of Toronto, Toronto, Canada,* ²*Department of Pathology and Comprehensive Cancer Center, University of Michigan Medical School, Ann Arbor,* ³*Massachusetts General Hospital, Harvard Medical School, Boston, United States*

P337 MECHANISMS FOR METHOTREXATE CHEMOTHERAPY-INDUCED BONE GROWTH ARREST AND OSTEOPENIA IN GROWING LONG BONES

C. J. Xian*¹, J. C. Cool¹, C. E. Macsai¹, M. Covino¹, M. Scherer¹, C. Fan¹, B. K. Foster¹

¹*Department of Orthopaedic Surgery, Women and Children Hospital, Adelaide, Australia*