SEPTEMBER 9-12, 2022
AUSTIN, TX, UNITED STATES
+ONLINE EXPERIENCE

ASBMR
The American Society for Bone and Mineral Research

MEDIA ADVISORY

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ASBMR 2022 Annual Meeting

September 9-12 in Austin, TX, United States
On Twitter @ASBMR, #ASBMR2022

New Research on the Global Epidemiology of Hip Fractures, Melanoma Bone Growth, Cachexia Syndrome and More at the ASBMR 2022 Annual Meeting

The American Society for Bone and Mineral Research (ASBMR) 2022 Annual Meeting will convene in-person this year in Austin, TX, United States, bringing together a global community of clinicians and researchers. As the premier scientific meeting on bone, mineral and musculoskeletal science, ASBMR 2022 will showcase the latest research and findings among a variety of disciplines including a studies on hip fractures, melanoma bone growth, cachexia syndrome, type 1 diabetes, and more.

Learn more about the upcoming highlights of the ASBMR 2022 Annual Meeting with featured research studies found below. Press are invited to cover the event in-person.

WHAT: American Society for Bone and Mineral Research (ASBMR) 2022 Annual Meeting (http://www.asbmr.org/annual-meeting)

WHEN: September 9-12, 2022

WHERE: Austin, Texas, USA

RSVP: To register for press credentials and attend the meeting, please contact Taylor Collison at tcollison@asbmr.org

Featured Studies at ASBMR 2022 Annual Meeting

For a complete program, please visit www.asbmr.org/official-program. Full abstracts are available to all registered media or upon request. For more media information and registration details, please contact Taylor Collison via email at tcollison@asbmr.org.

Please note that all abstracts are embargoed until one hour after the presentation times noted below.

- **Plenary lectures cover the scientific advances in G protein-coupled receptors and skeletal stem cells**
    - Gerald D. Aurbach Lecture
      Structural Insights into G Protein-Coupled Receptor Signaling by Brian Kobilka MD (Nobel Laureate, 2012); Stanford University School of Medicine
      Friday, September 9 | 8:00 am – 9:30 am

    - Louis V. Avioli Lecture
      The Many Faces of Skeletal Stem Cells by Pamela Robey PhD; National Institute of Dental and Craniofacial Research, United States
      Saturday, September 10 | 08:00 am – 9:30 am

- **New research predicts doubling of hip fractures worldwide by 2050 with risk especially great among elderly men:** Osteoporotic hip fracture, already a dangerous and debilitating problem for older men and women worldwide, is poised to become a far more severe global public-health issue as the population grows older and frailer, according to new research being presented. The risk— and thus the need for far better study, prevention and treatment of osteoporosis and fractures— is especially great among men and those over 85 years old, according to the researchers, who noted men are less likely to be given bone strengthening medications following hip fracture. (Note: News release also available)

- **Antibiotics may make melanoma worse, by depleting the gut microbiome:** Researchers found that the use of broad-spectrum antibiotics in mice with malignant melanoma, an aggressive form of skin cancer, accelerated their metastatic bone growth, likely because the drugs depleted the mice's intestinal flora and weakened their immune response.

- **How antacids affect the risk of osteoporosis:** Clodronate (an oral bisphosphonate, dispensed in capsules or tablets to treat osteoporosis in post-menopausal women) is frequently co-prescribed with various types of antacids, including the class of drugs known as proton-pump inhibitors (such as the over-the-counter medicines Prilosec and Prevacid). Experts will present findings from a new 3-year study of women using oral clodronate that show the efficacy of clodronate to reduce fracture risk was inhibited far more by the consumption of proton-pump inhibitors than by other classes of antacid.

- **Fish oil may be snake oil for broken bones:** Despite the widespread belief that high doses of vitamin D3 supplements and omega-3 fatty acid supplements derived from fish oil are good for bone strength, a recent randomized controlled trial found that both claims are suspect. Supplemental vitamin D3 vs. placebo did not reduce fractures in midlife to older adults, and fish-oil supplements had no effect on non-vertebral fractures.

- **Building sturdier bones in girls with Type 1 diabetes:** Weight-bearing physical activity stimulates bone growth and thus may limit the harmful effects of Type 1 diabetes,

which lowers bone mineral density and puts people at greater risk of fractures. A cross-sectional analysis of girls ages 10-16 years found that the harmful effect of diabetes on bone health was most pronounced in those with less weight-bearing activity.

- **New vertebral stem cell discovery:** Findings from a research study identify a new stem cell type responsible for spine metastases. The cells are located at the vertebral endplates and contribute to vertebral metastatic tropism — organoids derived from them display an enhanced ability to attract and recruit tumor cells and targeting them reduces vertebral metastatic rates in living organisms.

- **Protection against cancer induced cachexia syndrome:** New research suggests blocking the exercise hormone irisin could be a novel target for the treatment of cachexia, the severe muscle atrophy that is a common and devastating side effect of cancer.

- **Mouse digits give new clues on bone regeneration:** Researchers tested the effects of aging on the ability of mice to grow back amputated digit tips, including bone, nail, and connective tissue. Regeneration is affected when mice run out of stem cells, necessary components of new bone and tissue growth. But in mice both old or young, and those that have been repeatedly injured, age-related changes in the micro- and macroenvironment also have detrimental effects on mammalian digit tip regeneration.

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