



# Menopause

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**Estradiol fluctuations and depressive history as risk factors for menopausal depression**

Barbara L. Parry, MD

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**High-density lipoprotein cholesterol and arterial calcification in midlife women: the contribution of estradiol and C-reactive protein**

Gretchen Swabe, MS, Karen Matthews, PhD, Maria Brooks, PhD, Imke Janssen, PhD, Norman Wang, MD, MS, and Samar R. El Khoudary, PhD, MPH, FAHA

*The protective cardiovascular association of higher high-density lipoprotein cholesterol levels on aortic artery calcification was modified by estradiol but not C-reactive protein concentrations. The pathways through which estradiol might influence this association should be further investigated.*

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**Biopsychosocial predictors of depressive symptoms in the perimenopause—findings from the Swiss Perimenopause Study**

Jasmine Willi, MSc, Hannah Süss, MSc, Jessica Grub, MSc, and Ulrike Ehlert, PhD

*Estradiol fluctuations were shown to be predictive of depressive symptoms in the perimenopause. Moreover, the presence of burdensome complaints and chronic stress, as well as a poor self-evaluation seem to promote depressive symptoms in perimenopausal women.*

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**Impact of prior preterm or term small for gestational age birth on maternal blood pressure during the menopause transition in the Study of Women's Health Across the Nation**  
Yamnia I. Cortés, PhD, MPH, FNP, Maria Brooks, PhD, Emma Barinas-Mitchell, PhD, Karen A. Matthews, PhD, Rebecca C. Thurston, PhD, and Janet M. Catov, PhD  
*This study suggests that the women with a history of preterm and term small for gestational age delivery have higher blood pressure (BP) than women with all term appropriate for gestational age births during the menopause transition, but that rate of change in BP does not differ in these groups relative to final menstrual period. These findings are important as elevations in BP in these groups of women may be linked to future cardiovascular disease.*
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**Satisfaction with prophylactic risk-reducing salpingo-oophorectomy in BRCA mutation carriers is very high and little dependent on the participants' characteristics at surgery: a prospective study**  
Giovanni Grandi, MD, Margaret Sammarini, MD, PhD, Laura Cortesi, MD, Angela Toss, MD, PhD, Laura Botticelli, MD, Federico Varliero, MD, Giovanna Sighinolfi, MD, Elena Barbieri, MD, and Fabio Facchinetti, MD, PhD  
*The findings of this prospective analysis suggest that, in women with BRCA mutations, satisfaction with risk-reducing salpingo-oophorectomy is very high and mostly independent of participant characteristics at the time of surgery.*
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**Sexual behaviors and function during menopausal transition—does menopausal hormonal therapy play a role?**  
Krzysztof Nowosielski, MD, and Marcin Sidorowicz, MD, PhD  
*In women during menopausal transition, sexual behaviors were different in menopause hormone therapy users compared to non-users. However, using menopause hormone therapy was not associated with modification of sexual function, decreasing the risk of sexual dysfunction, or sexual problems.*
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**High-sensitivity cardiac troponin T and the risk of heart failure in postmenopausal women of the ARIC Study**  
Imo A. Ebong, MD, MS, Machel D. Wilson, PhD, Alain G. Bertoni, MD, MPH, Duke Appiah, PhD, Tamar Polonsky, MD, MSC, Erin D. Michos, MD, MHS, Christie Ballantyne, MD, and Patricia Chang, MD, MHS  
*Irrespective of early menopause status, high sensitivity cardiac troponin T elevation is associated with greater heart failure (HF) incidence but this association is partially explained by HF risk factors. Even in the absence of high sensitivity cardiac troponin T elevation, early menopause is significantly associated with HF incidence after accounting for HF risk factors.*
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**Refinement of the German Day-to-Day Impact of Vaginal Aging questionnaire in perimenopausal and postmenopausal women using item response theory and classical test theory**  
Michaela Gabes, MSc, Petra Stute, MD, and Christian J. Apfelbacher, PhD  
*This study aimed to assess the structural validity of the German version of the Day-to-Day Impact of Vaginal Aging (DIVA) questionnaire. A validated refined version of the DIVA was created and showed several excellent measurement properties.*

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**Bone mineral density in women with deep infiltrating endometriosis who have undergone early bilateral oophorectomy**

Anna Gosset, MD, Claire Escanes, MD, Jean-Michel Pouilles, MD, Fabien Vidal, MD, PhD, Yann Tanguy Le Gac, MD, Geneviève Plu-Bureau, MD, PhD, and Florence A. Trémollières, MD, PhD

*Lumbar spine and femoral neck bone mineral densities (BMD) were compared in women with and without pelvic deep infiltrating endometriosis who underwent early bilateral oophorectomy. Each standard deviation of lumbar spine and femoral neck BMD was associated with an increase of more than twice the likelihood of a risk of deep infiltrating endometriosis even after adjustment for covariates.*

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**Effects of high protein, low-glycemic index diet on lean body mass, strength, and physical performance in late postmenopausal women: a randomized controlled trial**

Thaís R. Silva, PhD, Suzana C. Lago, MD, MSc, Andressa Yavorivski, BSc, Laís L. Ferreira, MSc, Tayane M. Figuera, MD, PhD, and Poli Mara Spritzer, MD, PhD

*High dietary protein intake did not promote increases in lean mass, muscle strength, physical function gain, or well being in older women consuming a low glycemic index diet.*

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**Comparative validity and reliability of the WeChat-based electronic and paper-and-pencil versions of the PISQ-12 for collecting participant-reported data in Chinese**

Chenyu Zhang, MD, Zhijing Sun, MD, Jun Yang, MD, Tao Xu, PhD, Lan Zhu, MD, and Jinghe Lang, MD

*The results indicate that the WeChat-based electronic version of the PISQ-12 in Chinese was preferred to the paper version and had excellent consistency with the paper version and high test-retest reliability.*

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**Clinical Corner**

**NAMS Practice Pearl**

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**What providers need to know about progestogens in hormone therapy**

James H. Liu, MD, NCMP

*All progestogens have the common property of inducing secretory endometrial changes to prevent endometrial hyperplasia and hormone-responsive endometrial cancer, but dose and duration matter. This Practice Pearl will help clinicians become familiar with the dose and duration of therapy for the particular progestogen they choose for hormone therapy.*

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**Personal Perspective**

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**Menopause, the gut microbiome, and weight gain: correlation or causation?**

Sarah L. Becker, BA, and JoAnn E. Manson, MD, DrPH, NCMP

*The microbiome is a central regulator of both systemic and estrogen metabolism, and is altered by the menopausal transition, suggesting an important role of the microbiome in the increased metabolic risk faced by menopausal women. The interrelationship between menopause and the gut microbiome may represent a new frontier for the development of novel therapeutics to address menopause-related metabolic risk.*

## Review Articles

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### **The impact of frailty in older women undergoing pelvic floor reconstructive surgery**

Jonathan S. Shaw, MB, BCh, BSc, Elisabeth Erekson, MD, MPH, and Holly E. Richter, PhD, MD  
*Understanding the concept of frailty and how it may affect surgical decisions and outcomes is essential. The timed up and go test, life space assessment and Mini-Cog assessment at a minimum should be considered preoperatively in patients over the age of 65 years old planning pelvic floor or elective surgery.*

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### **Weight loss outcomes in premenopausal versus postmenopausal women during behavioral weight loss interventions: a systematic review and meta-analysis**

Zoe O. Thomson, APD, Jaimon T. Kelly, APD, PhD, Amanda Sainsbury, PhD, and Marina M. Reeves, AdvAPD, PhD

*This review compared changes in weight, fat mass and lean mass in premenopausal versus postmenopausal women in dietary weight loss trials. Based on current available evidence, weight loss interventions are similarly effective at eliciting weight loss for pre- and postmenopausal women.*

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