Literature

Guidelines	Relevant Guidelines
International Menopause Society (IMS) recommendations and key messages on women's midlife health and menopause	• Menopause-related decline in estrogen is the major cause of an increase abdominal adiposity among midlife women (**Very High, key message**) • Staging of reproductive aging should generally follow the StRAw+10 guidelines. (**good practice point**) • The diagnosis of menopause is a clinical diagnosis not dependent on special investigations. Supportive criteria described in StRAw+10 should be used for staging women who cannot be staged based on menstrual cycle characteristics. (**good practice point**) • Presently, the gold standard StRAw+10 criteria for determining menopause stage are based on menstrual cycle characteristics, including regularity and skipping of menstrual cycles, with blood tests for estradiol, follicle stimulating hormone (FSH) and/or anti-Müllerian hormone (AMH) conducted only as supportive criteria or as primary criteria for women who cannot otherwise be staged. (**Very High, Grade** A) • while the StRAw+10 guidelines, which rely on menstrual cycle irregularity, provide a useful clinical framework for identifying menopausal stages, the onset of menopausal symptoms is frequently earlier than suggested by StRAw+10, and VMS together with changed menstrual flow may signal the onset of the menopause transition. (**key message**) • In women >40 years of age, the onset of moderately-to-severely bothersome VMS, regardless of menstrual cycle changes should prompt a clinical evaluation of reproductive staging (**High, Grade A**) • The diagnosis of POI should be suspected in women younger than age 40 years with amenorrhea or irregular menstrual cycles for more than 4 months and with confirmed FSH values >25 iU/L (**good practice point**)

	• Menopause between ages 40-<45 is termed early menopause (**good practice point**)

(NICE)
Menopause: Identification & Management
	• Identify the following, without laboratory tests, in otherwise healthy women, trans men and non-binary people registered female at birth who are aged 45 or over and have menopause-associated symptoms:
	  ○ perimenopause, if they have vasomotor symptoms that have recently started and any changes in their menstrual cycle
	  ○ menopause, if they have not had a period for at least 12 months and are not using hormonal contraception
	  ○ menopause, in those who have had a hysterectomy, based on the type and combination of symptoms they have (for example, vasomotor symptoms).
	• Take into account that it can be difficult to identify menopause in people who are taking hormonal treatments, for example, for the treatment of heavy menstrual bleeding.
	• Be aware that people from some ethnic minority backgrounds and people with some lifelong conditions may experience menopause at a younger age.
	• Do not use the following laboratory and imaging tests to identify perimenopause or menopause in people aged 45 or over:
	  ○ anti-Müllerian hormone
	  ○ inhibin A
	  ○ inhibin B
	  ○ oestradiol
	  ○ antral follicle count
	  ○ ovarian volume
	• Do not use a follicle-stimulating hormone (FSH) blood test to identify menopause in people using combined oestrogen and progestogen contraception or high-dose progestogen.
	• Consider using the person's serum FSH level to confirm menopause only:
	  ○ in people aged 40 to 45 with menopause-associated symptoms, including a change in their menstrual cycle
	  ○ in people under 40 in whom menopause is suspected (see also diagnosing and managing premature ovarian insufficiency).
	  ○ See also the recommendations on offering psychological support to:
	  ▪ people experiencing early menopause (aged 40 to 44) and
	  ▪ people with premature ovarian insufficiency.

Canadian Menopause Society	• The vast majority of women in mid-life experience menopausal symptoms, the hallmark being vasomotor symptoms. A significant portion of these women have severe symptoms that greatly affect their quality of life (high) [1] • Genitourinary syndrome of menopause is common and impairs quality of life, sexual function, and partner relationships (high). [2] • Women entering menopause should be educated about the progressive impact of estrogen deficiency on urogenital health and the many options available for symptom relief (strong, high). • Menopausal women should be comprehensively screened for genitourinary syndrome of menopause symptoms on an ongoing basis, as symptoms can present insidiously and become bothersome long after the menopausal transition (strong, high). • The perimenopausal period is a window of vulnerability for the development of depressive symptoms and major depressive episodes, even in women with no history of depression (high). [3] • Factors related and unrelated to menopause contribute to the occurrence and severity of mood symptoms in mid-life. Factors related to menopause are those that are context-related or timing-related, such as vasomotor symptoms, sleep disturbances, and health problems, whereas those unrelated to menopause represent a continuum of risk that precedes menopause, or longitudinal risk factors, such as unemployment, smoking, and lifetime history of anxiety (high). • Recent large-scale studies show an elevated risk of depression in women following hysterectomy, with or without oophorectomy. A history of primary ovarian insufficiency, which occurs in 1% of women, is also associated with an increased risk of depression (high). • Poor sleep quality, as measured both subjectively and objectively, is common among women in the perimenopausal and postmenopausal periods (high).

[1] Society of Obstetricians and Gynaecologists of Canada. (2021). *Guideline No. 422a: Menopause—Vasomotor symptoms, prescription therapeutic agents, complementary and alternative medicine, nutrition, and lifestyle*. **Journal of Obstetrics and Gynaecology Canada, 43**(9), 1188–1207. https://doi.org/10.1016/j.jogc.2021.05.018

[2] Society of Obstetricians and Gynaecologists of Canada. (2021). *Guideline No. 422b: Menopause and genitourinary health*. **Journal of Obstetrics and Gynaecology Canada, 43**(9), 1208–1223. https://doi.org/10.1016/j.jogc.2021.05.019

[3] Society of Obstetricians and Gynaecologists of Canada. (2021). *Guideline No. 422c: Menopause—Mood, sleep, and cognition*. **Journal of Obstetrics and Gynaecology Canada, 43**(9), 1224–1239. https://doi.org/10.1016/j.jogc.2021.05.020

	• Cognitive symptoms, such as worsening memory and slower cognitive speed, are often reported among newly menopausal women, and these symptoms have been demonstrated in prospective, longitudinal studies (moderate). • Low sexual desire in combination with distress is most common in women in mid-life (high). [4] • The patient's problem should be categorized as related to desire, • arousal, pain, or orgasm, in order to facilitate treatment and to triage care (strong, moderate). • Health care providers should include a sexual screening history and physical examination in the initial evaluation of menopausal women (strong, low).

[4] Society of Obstetricians and Gynaecologists of Canada. (2021). Guideline No. 422d: Menopause and sexuality. Journal of Obstetrics and Gynaecology Canada, 43(9), 1240–1255. https://doi.org/10.1016/j.jogc.2021.05.021

Citation	Findings

Exploring symptom clusters across the menopausal stages – systematic review and meta-analysis [5]	Systematic review of publications from 1996-2023 across PubMed, Medline, Cochrane, APA PsychINFO: screened 425 articles, included 14 meeting relevance, scientific rigor, and focus on symptom clustering among climacteric women. Encompassing over 14,000 individuals, ages 30-64, comparing perimenopausal and postmenopausal women
	
	• four distinct groups of symptom clusters identified: somatic, vasomotor, psychological, and sexual
	• Statistically significant difference in somatic sx (joint pain, fatigue, headaches); No conclusive statistical difference in VMS, psychological, and sexual symptoms between perimenopausal and postmenopausal women
	• Heterogeneity in experiences and manifestation of VMS, psychological and sexual symptoms can be influenced by multitude of factors such as nutrition, socio-cultural expectations, socioeconomic, lifestyle factors, etc.
	• Need a more holistic and individualized approach to managing menopausal symptoms in clinical practice:
	  ○ HCPs should prioritize assessment and management of somatic symptoms, particularly perimenopausal individuals
	  ○ Integrated behavioral and physical health needed
	  ○ Support development of standardized screening tools and guidelines for symptom evaluation across different menopausal stages
	  ○ Public health should promote education on menopause, reduce stigma, encourage lifestyles interventions

Cultural Differences in Women's Experience of Menopause: A Qualitative Review [6]	Systematic review of qualitative studies seeking understanding of how women from different cultures perceive and experience menopause. Searched CINAHL, PubMed, Scopus, PyschINFO, Web of Science for published articles 2000-2025 that compared cultural differences; CASP quality assessment conducted. 13 articles from 8 countries identified, 17 distinct cultural groups included: • Three main themes identified:

[5] Khalaf, A., Mathew, R., & Nayak, S. G. (2025). Exploring symptom clusters across the menopausal stages: A systematic review and meta-analysis. Sexual & Reproductive Healthcare, 45, 101137. https://doi.org/10.1016/j.srhc.2025.101137

[6] Whelan, É., Dempsey, M., & Chi, C. V. Y. (2026). *Cultural differences in women's experience of menopause: A qualitative review*. **Journal of Cross-Cultural Psychology, 57**(X), 1–23. https://doi.org/10.1177/00220221261418307

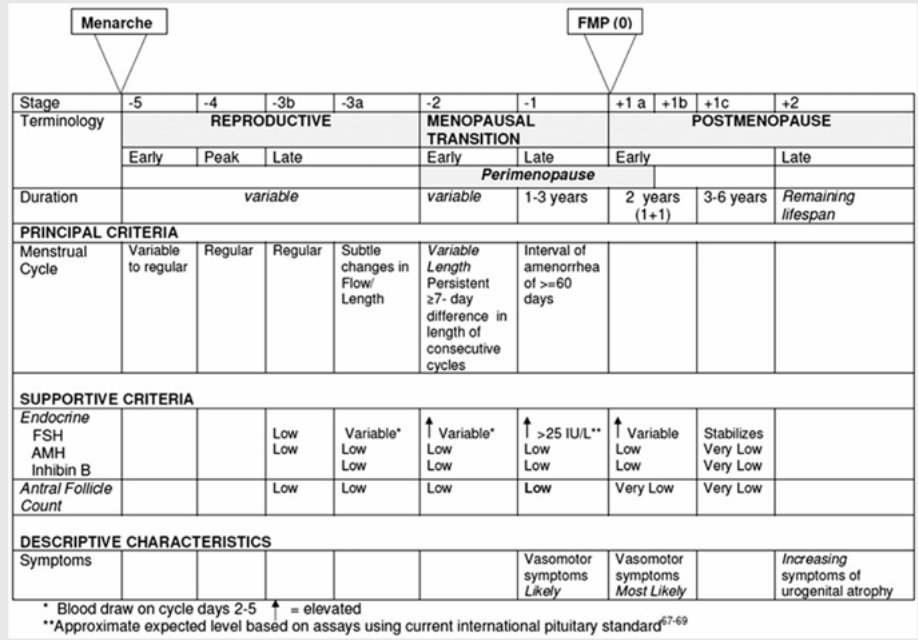
	○ Narrative on menopause – perception, attitudes towards symptoms, public and private discussion ○ The support spectrum – influence of family, social norms, religious beliefs, language ○ Navigating healthcare: preferences and approaches – how culture shapes preferences for health systems and treatment • "collectivist" culture tends to influence people to discuss menopause privately, and "individualistic" culture discussion more open – this review highlights greater trend towards openness which can be facilitated by other venues for support (e.g., online platforms) • One-size-fits-all approach can lead to overlooking needs of women from cultures where menopause is downplayed • Influencing factors to the menopausal experience ○ Spousal attitudes and support ○ Societal & cultural perception of menopause (e.g., seen as a life transition to higher social status or negatively associated with loss of fertility) ○ Religion offers strength and support • Women from collectivist cultures and hybrid cultural backgrounds frequently use culturally embedded expressions to describe menopausal experiences, instead of direct translations of menopausal symptom terminology from Western languages • Culturally positioning menopause as aa natural progression can enhance overall experience in healthcare settings – Western medicine does not replace traditional practices. Many combine biomedical and natural/culturally rooted approaches
"Because I felt so alone": trans and gender diverse people's needs and preferences for menopausal related information and resources [7]	Qualitative study with 3 focus groups of 17 participants aged 18-69, using purposeful sampling utilizing ACON (AUS largest LGBTQIA+ community health org). Equal representation of men and non-binary participants. • Need for diverse representations of menopause – normative scripts largely based on cisgender heterosexual women's experiences • Highlighted need for affirming and empowering view of menopausal experiences • Access to information and resources includes utilizing appropriate terminology (e.g., you/your) • Self-diagnosis is an important element to understanding own health and maintaining agency over needs and preferences • Generated 3 principles for more inclusive menopause care

[7] Kerryn Drysdale, Yeşim Karasu & Lucy Watson (22 Jan 2026): "Because I felt so alone": trans and gender diverse people's needs and preferences for menopausal related information and resources, International Journal of Transgender Health, DOI: 10.1080/26895269.2026.2618635

	○ Trans and gender diverse people need accurate information about menopause ○ Inclusivity needs to be embedded throughout any resources related to menopause ○ Representation of diversity is key to effective and resonant inclusivity
The Menopause Rating Scale (MRS) scale: A methodological review[8]	Large multi-national survey (9 countries, 4 continents) from 2001/2002 used to assess psychometric and methodological characteristics of the Menopause Rating Scale (MRS); • Reliability: reliability measures found to be good across countries (consistency and test-retest stability) except test-retest sample size was small • Validity: internal structure of MRS across countries was similar (correlations were 0.7-0.9, lower for sub-scales. Direct comparison between Europe and North America is possible, but caution recommended for comparisons with data from Latin America and Indonesia
An extended Menopause Rating Scale II: a retrospective data analysis[9]	Retrospective cohort analysis to discuss statistically reasonable inclusion of additional questions to the Menopause Rating Scale II for daily use in clinical practice; N=419; MRS 2 extended with parameters of change in weight, headaches, skin changes, changes in hair growth, hair loss, and whether therapy was desired. • Internal consistency improved with the addition of 'changes in weight,' 'headaches,' and 'skin changes,' – authors recommend inclusion in MRS2 • Desire for therapy varied (42-60%) based on addition of specific questions Practitioners should keep in mind desire for therapy does not coincide with symptom prevalence or severity

[8] Heinemann, K., Rübig, A., Potthoff, P., Schneider, H. P. G., Strelow, F., Heinemann, L. A. J., & Thai, D. M. (2004). The Menopause Rating Scale (MRS) scale: A methodological review. Health and Quality of Life Outcomes, 2, Article 45. https://doi.org/10.1186/1477-7525-2-45

[9] L. Honermann, L. Knabben, S. Weidlinger, N. Bitterlich & P. Stute (2020): An extended Menopause Rating Scale II: a retrospective data analysis, Climacteric, DOI: 10.1080/13697137.2020.1775808

Executive summary of the Stages of Reproductive Aging Workshop D 10: addressing the unfinished agenda of staging reproductive aging [10]	 • STRAW +10 simplified bleeding criteria for early and late stage menopausal transition, recommended modifications to criteria for late reproductive and early post menopause stages, provided information on the duration of the late transition and early post menopause, and recommended application regardless of women's age, ethnicity, body size, or lifestyle characteristics.

Stage	-5	-4	-3b	-3a	-2	-1	+1 a	+1b	+1c	+2
Terminology	REPRODUCTIVE				MENOPAUSAL TRANSITION		POSTMENOPAUSE			
	Early	Peak	Late		Early	Late	Early			Late
					Perimenopause					
Duration	*variable*				*variable*	1-3 years	2 years (1+1)		3-6 years	*Remaining lifespan*
PRINCIPAL CRITERIA										
Menstrual Cycle	Variable to regular	Regular	Regular	Subtle changes in Flow/ Length	*Variable Length* Persistent ≥7- day difference in length of consecutive cycles	Interval of amenorrhea of >=60 days				
SUPPORTIVE CRITERIA										
Endocrine FSH AMH Inhibin B			Low Low	Variable* Low Low	↑ Variable* Low Low	↑ >25 IU/L** Low Low	↑ Variable Low Low	Stabilizes Very Low Very Low		
Antral Follicle Count			Low	Low	Low	Low	Very Low	Very Low		
DESCRIPTIVE CHARACTERISTICS										
Symptoms						Vasomotor symptoms *Likely*	Vasomotor symptoms *Most Likely*			*Increasing* symptoms of urogenital atrophy

* Blood draw on cycle days 2-5 ↑ = elevated
**Approximate expected level based on assays using current international pituitary standard[67-69]

[10] American Society for Reproductive Medicine. (2012). Executive summary of the Stages of Reproductive Aging Workshop +10: Addressing the unfinished agenda of staging reproductive aging. https://www.asrm.org/practice-guidance/practice-committee-documents/executive-summary-of-the-stages-of-reproductive-aging-workshopd10-addressing-the-unfinished-agenda-of-staging-reproductive-aging-2012/