



# Integrative Healthcare in Menopause

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## **DISCLOSURE OF RELEVANT FINANCIAL RELATIONSHIP(S) WITH INELIGIBLE COMPANIES**

- Nothing to disclose

## **REFERENCES TO OFF-LABEL USAGE(S) OF PHARMACEUTICALS OR INSTRUMENTS**

- Nothing to disclose

*All relevant financial relationships have been mitigated.*

# Learning Objectives

- Examine menopause terminology and its impact.
- Investigate recommendations for non-hormonal and non-pharmacological treatments in menopausal symptoms.





## Which physicians take supplements? What do they take?

- Prevalence
  - Nearly 50% physicians <45 y/o
  - >60% physicians >45 y/o
- Sex/Gender
  - Over 50% men
  - Over 60% women
- Top
  - MVI, Vit D, Calcium
  - Omega 3
  - Anti-oxidants

J Acad Nutr Diet. 2014 Mar;114(3):436-43





## Are Integrative Medicine modalities discussed with providers?

- 23-80% patients do NOT disclose use to their physicians. Why:
  - Doctor didn't ask
  - Anticipated disapproval or disinterest
  - Anticipated inability to help
  - Patient perceived irrelevant
- For those who did discuss reported improved overall communication and satisfaction

# Weight of the evidence

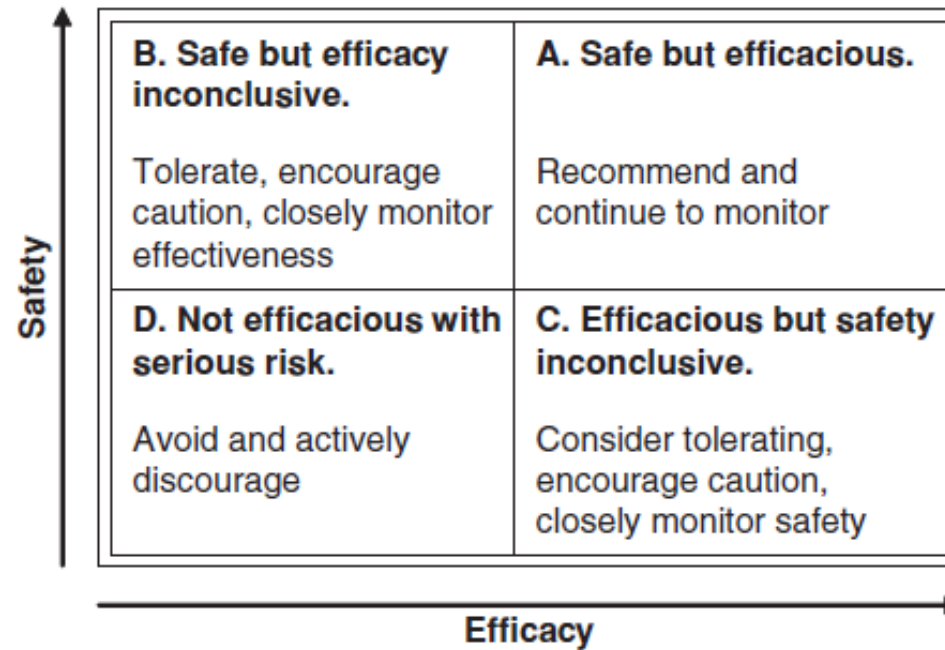
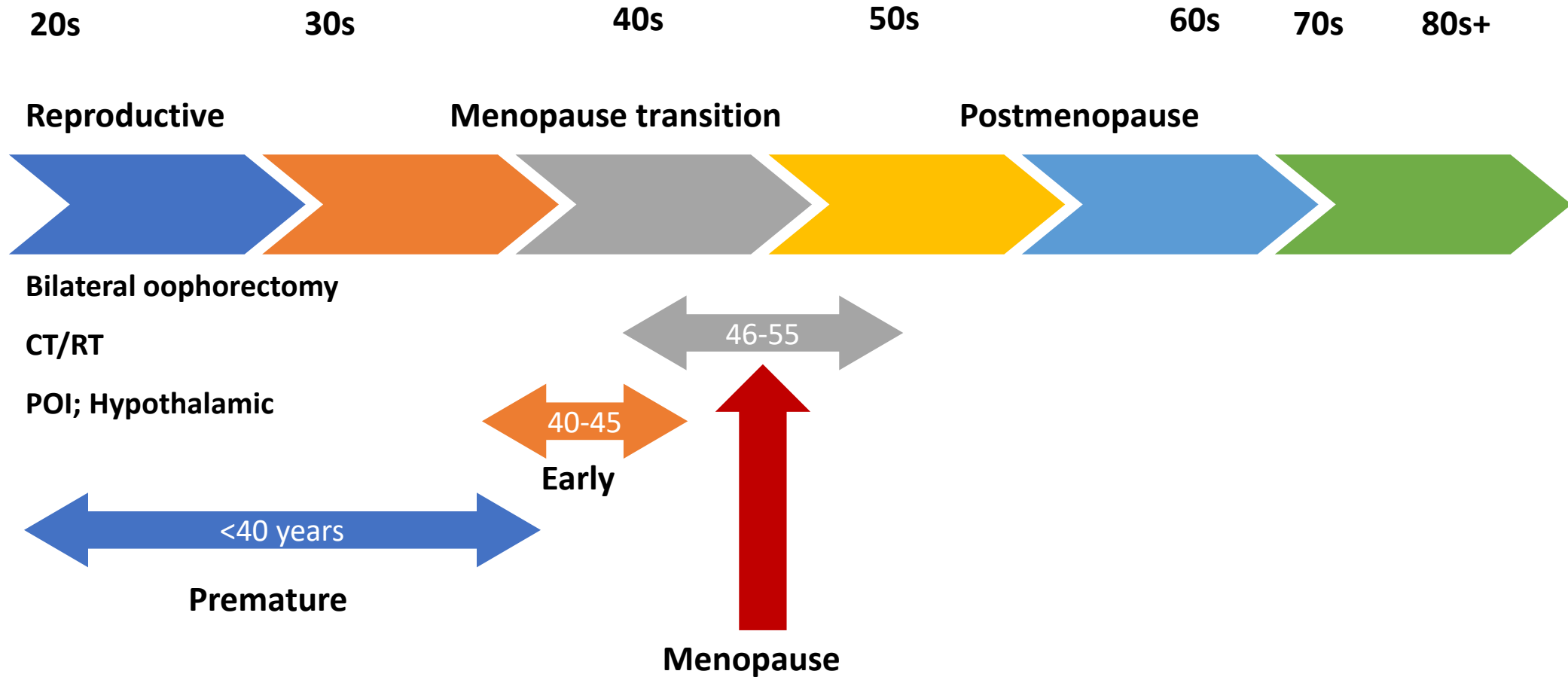


Figure 1. Clinical decision making based on risk versus efficacy. Adapted from Cohen MH and Eisenberg DM.<sup>38</sup>

# Timing of Menopause





## A woman's lifetime



Perimenopause

First signs of change



Menopause

- Diagnosed 12 months retrospectively
- Average age 51.4 years
- Vasomotor symptoms (VMS) reported by more than 70%
  - 70% remain untreated
- Median duration of VMS 7.4-10 yrs
- **Menopausal hormone therapy (MHT) most effective treatment for VMS**



Cardiovascular system

Mammary tissue

Pancreas

Liver

Adipose tissue

Bone marrow

Musculoskeletal system



Nervous system

Thyroid gland

Respiratory system

Adrenal gland

Kidneys

Urinary system

Gastrointestinal system

Immune system

Reproductive system

# Early and premature menopause

- Menopause before the natural age of menopause (menopause before age 45) or primary ovarian insufficiency)
- Associated with adverse long term health consequences
  - Increased overall mortality
  - Coronary heart disease
  - Dementia
  - Parkinsonism
  - Osteoporosis
  - Mood disorders
  - Elevated risk of genitourinary syndrome of menopause & hypoactive sexual desire disorder (HSDD)

## Menopause as a result of BSO

associated with more severe vasomotor symptoms (VMS), higher rates of mood disorders, sleep disturbances, joint symptoms, sexual dysfunction & lower QOL than natural menopause

Content created by author for this presentation





# Claire

50 y/o healthy female is frustrated:

Hot flashes - every hour or so. Worse with stress – terrible at work.

Average risk for breast cancer. Normal liver/kidney function.

Distrusts medication and doesn't want a prescription for anything.

Friend started using a product that she “swears by”. Wants to know if she should take it?







## Combination product:

- Black cohosh
- Dong quai
- Sage
- Milk thistle





# Black cohosh (*Cimicifuga racemosa*)

- Most common botanical for menopause
- Member of the buttercup family, native to North America
  - Use root and underground portion
  - (don't confuse with blue cohosh)
- Cochrane Review: 16 studies, 2000 women
  - Median dose 40mg, duration 6mo
  - Insufficient evidence of effect
  - Need for further research



# Black cohosh - safety

- Liver:
  - Prospective trial (n=1200) – no transaminitis or liver injury
  - Case reports (50) – liver toxicity with products labeled black cohosh
    - Usual timing 2-12 weeks
- Breast cancer
  - Population/observation studies: no negative effect **but** unknown safety in high risk women
- Perhaps reason milk thistle included in product



## Dong quai (*Angelica sinensis*)

- Commonly in combination products
- Small studies, mixed data
- Caution: increases menstrual flow
  - Interaction with anti-coagulation

[Clin Exp Obstet Gynecol.](#) 2003;30(4):203-6  
[Chin J Integr Med.](#) 2011 Dec;17(12):883-8



# Sage

- Traditionally used in sweating
  - Has been applied to VMS
- Open label trial
  - Safe, tolerable
  - 50% reduction in 4wk
  - 64% at 8 wk
- Avoid ingesting essential oils and extracts
  - Thujone: neurotoxin
- Teas and capsules safe, as is culinary spice





# What to tell Claire?





# Soy

## Isoflavones/flavonoids

- Active at Estrogen receptor (beta>alpha) as agonist & antagonist
- Daidzin
  - Equol is metabolite
- Genistein
- Glycitein, biochanin A, and formononectin



# Isoflavones

- Menopause Society – mixed
  - variable content (type, dose)
  - Higher quality studies needed
- Cochrane review: inadequate evidence
- Systematic review & modeling
  - 16 studies, ~1700 women
  - Varied interventions
  - Maximum effect : 25% reduction
    - 57% effect of Estradiol, but delayed (13wks)

[Menopause](#). 2011 Jul;18(7):732-53

[Cochrane Database Syst Rev](#). 2013 Dec 10;(12):

[Br J Clin Pharmacol](#). 2015 Apr;79(4):593-604

# Soy foods

- Dietary Soy has NOT been associated with increased risk of breast cancer
- Soy intake lowers risk pre- & post-menopausal breast cancer in Asian countries
  - Association less clear in Western countries
- Higher isoflavone levels (soy) associated with decreased endometrial cancer (OR 0.81)
- Soy after breast cancer diagnosis associated with decreased recurrence (HR 0.67)
  - ER+/PR+; anastrozole



PLoS One. 2014 Feb 20;9(2):  
J Acad Nutr Diet. 2016 Nov 30  
CMAJ 2010 Nov 23; 182(17)1857





# Are isoflavone supplements safe?

- Likely safe
  - Unclear in patients with breast cancer history
- Endometrial hyperplasia (not atypia)
  - High doses (>150mg/day) used >5years associated with increased risk<sup>1</sup>
  - Meta-analysis 23 studies, ~1000 women no significant change<sup>3</sup>

(1) Fertil Steril. 2004 Jul;82(1):145-8

[Am J Med.](#) 2009 Oct;122(10):939-46

[\(3\) Oncotarget](#) 2016 Apr 5;7(14):17369-79

[Maturitas.](#) 2011 Mar;68(3):256-63





# S-Equol

- Daidzen metabolized to s-equol in “equol producers”
  - Dependent on gut microbiome
  - ER-beta receptor affinity
- Equol producers have lower VMS burden
- RCT: n=160, Japanese women, 12 wks, 10mg
  - Reduced VMS frequency & severity



# Isoflavone - Red Clover

- Variable content
  - Biochanin A
  - Formononetin
- Meta-analysis: reduced VMS by 2 hot flashes/day
  - Effect best in women with >5/day at baseline
  - Dose 80mg/day
- Meta-analysis: nonsignificant reduction in hot flashes/day initially, effect did not persist
- Apparently safe



# Magnesium

- Deficiency common and difficult to diagnose
- Indications:
  - Headache, dysmenorrhea, leg cramps
  - Hypertension, glucose metabolism when deficiency
- VMS
  - RCT ~300 women, no improvement in symptom scores or frequency
- Dosing
  - 250-500mg/day
  - Citrate, oxide, malate, glycinate



[Download Bottles, Pills, Medicine. Royalty-Free Vector Graphic - Pixabay](#)





# Navigating Natural Products

- NCCIH
  - [nccih.nih.gov](https://nccih.nih.gov)
- Natural Medicine database
  - [NaturalMedicines.com](https://NaturalMedicines.com)
- Consumer Lab
  - [consumerlab.com](https://consumerlab.com)
- Herbs at a glance
  - [nccih.nih.gov/health/herbsataglance](https://nccih.nih.gov/health/herbsataglance)



# 2023 Menopause Society Position statement

- Recommended Level I
  - Cognitive behavioral therapy
  - Clinical hypnosis
  - SSRI/SNRI/gabapentin/Fezolinetant
- Recommended Level II
  - Weight loss
  - Stellate ganglion block
- Recommend Against
  - Cooling/trigger avoidance/exercise/yoga/diet changes
  - Mindfulness/paced respirations/relaxation/supplements
  - Acupuncture

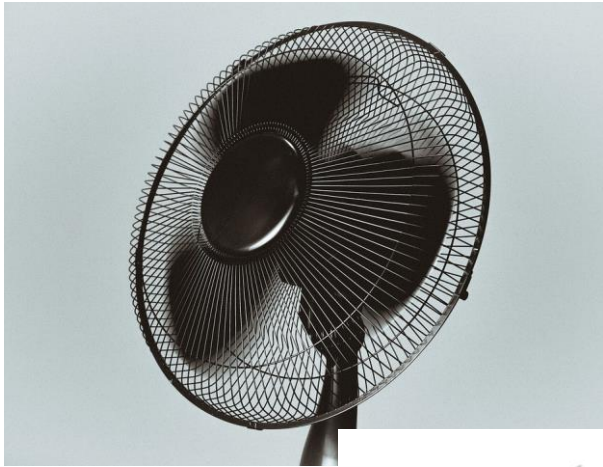
**TABLE 2.** *Treatment recommendations for vasomotor symptoms*

Category	Treatment
<b>Lifestyle</b>	Cooling techniques Avoiding triggers Exercise Yoga Dietary modifications Weight loss
<b>Mind-body techniques</b>	Cognitive-behavioral therapy Mindfulness-based interventions Clinical hypnosis Paced respiration Relaxation
<b>Prescription therapies</b>	SSRIs/SNRIs Gabapentin Pregabalin Clonidine Oxybutynin Suvorexant Fezolinetant
<b>Dietary supplements</b>	Soy foods and soy extracts Soy metabolites equol Supplements/Herbal remedies <sup>a</sup> Cannabinoids
<b>Acupuncture, other treatments, and to</b>	Acupuncture Stellate ganglion block Calibration of neural oscillations Chiropractic intervention





## Lifestyle changes & trigger avoidance



- Expert opinion that do not work, but consider
  - Dress in layers – natural fibers
  - Reduce ambient temperature
  - Use of fans and cool packs
- Avoid spicy foods or alcohol if makes worse





# Exercise

- Not effective for reduction in VMS
  - Systematic review: 5 studies, ~700 women
- Many other benefits
  - Stress reduction, mood enhancement, sleep effects, reduce chronic disease
- Low cost – enhanced social connection





# Yoga



- Improves **fatigue**, sleep, QOL, stress (especially after cancer treatment)
- Systematic review: Vasomotor symptoms
  - 8 trials, ~900 women
  - 10-12 wks, 90 min/week
  - Improved severity & psychological symptoms of menopause





# Hypnotherapy

- Small studies have shown effect
  - 5 weekly sessions with at-home practice
- RCT ~200 women >6HF/day
  - 5 weekly sessions vs. attention control
  - Reduction HF frequency 74% v. 17% at 12 weeks
  - Severity score also reduced
- Venlafaxine v. hypnotherapy
  - RCT, n=~70,
  - >3HF/day,
  - 4 tx arms – all overlapped





# Hypnotherapy

- Also useful for smoking, anxiety, sleep
- Finding a provider
  - American Society of Clinical Hypnosis ([asch.net](http://asch.net))

J Clin Psychol Med Settings. 2021 Dec;28(4):868-881  
Int J Clin Exp Hypn. 2021 Jul-Sep;69(3):323-345





# Cognitive Behavioral Therapy

- Psychotherapy
- Focused on thoughts & skills
- Structured
- Time limited
- Effective for mood and sleep
- Effectively delivered in groups, bibliotherapy, on-line/virtual
- Systematic review: 4 high quality studies with improvement



## MENOS-1

- Symptomatic women after breast cancer treatment
- Control (usual care)
- Group CBT
  - (90 min/wk for 6 weeks)
- Analysis baseline, 9 weeks, 26 weeks
- Reduced VMS problem rating
- Persisted at follow-up

## MENOS-2

- Control
- Intervention groups
  - Group: 2 hrs/wk, 4 weeks
  - Self-help: Intro, book, 2 wk call
  - Both: CD for home practice
- Baseline, 6wk, 26wk
- Improved VMS problem rating
- Secondary: improved mood, concentration



## MENOS@WORK

- Problematic VMS
  - >10/week
- Control
- Self-help CBT – 4 weeks
  - Shorter booklet from MENOS-2
- Baseline, 6wk, 20 wk





# Relaxation Practices

- Cochrane Review 2014 - Insufficient data
- Paced breathing – mixed data
  - 6 breaths/minute (n=92)
    - Hot flash reduction – dose related
  - Applied to breast cancer survivors and non-cancer patients (n=218)
    - No effect





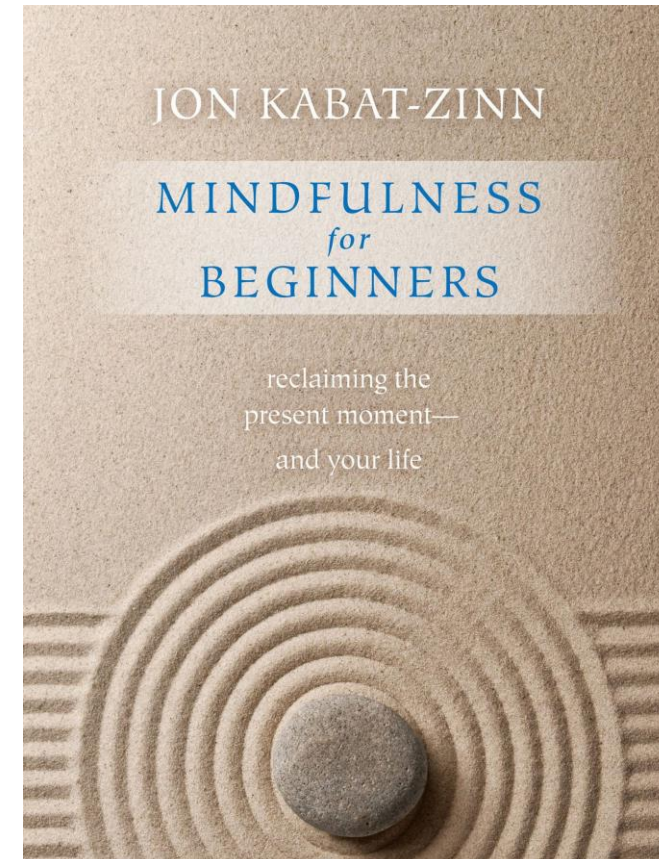
- Applied relaxation
  - Structured – with therapist & home practice
  - Progressive Muscle Relaxation through Rapid Relaxation
  - Effective for generalized anxiety disorder
- AR weekly group sessions with daily home practice for 12 wk
  - N=60, >7 HF/day
  - Reduced hot flashes frequency by 5/day (control by 1.9/day)





# Mindfulness

- Meditation
- Nonjudgmental awareness of this moment
- MBSR = Mindfulness Based Stress Reduction
  - Structured
  - group training
  - home practice
  - 8 weeks





# Mindfulness - MBSR

- N=110, ages 47-69, 8 Weeks
- Improved hot flash bother and intensity
  - QOL, sleep quality, stress, and anxiety





# Mindfulness

- MAAS = Mindfulness Attention Awareness Scale
  - 15 questions assess “frequency of mindful state”
    - Whether trained or not
- Database of 1744 women present for women’s health consults – improved MRS score with higher MAAS
  - Higher MAAS correlated with lower PSS-4 (perceived stress score)



# Mindfulness

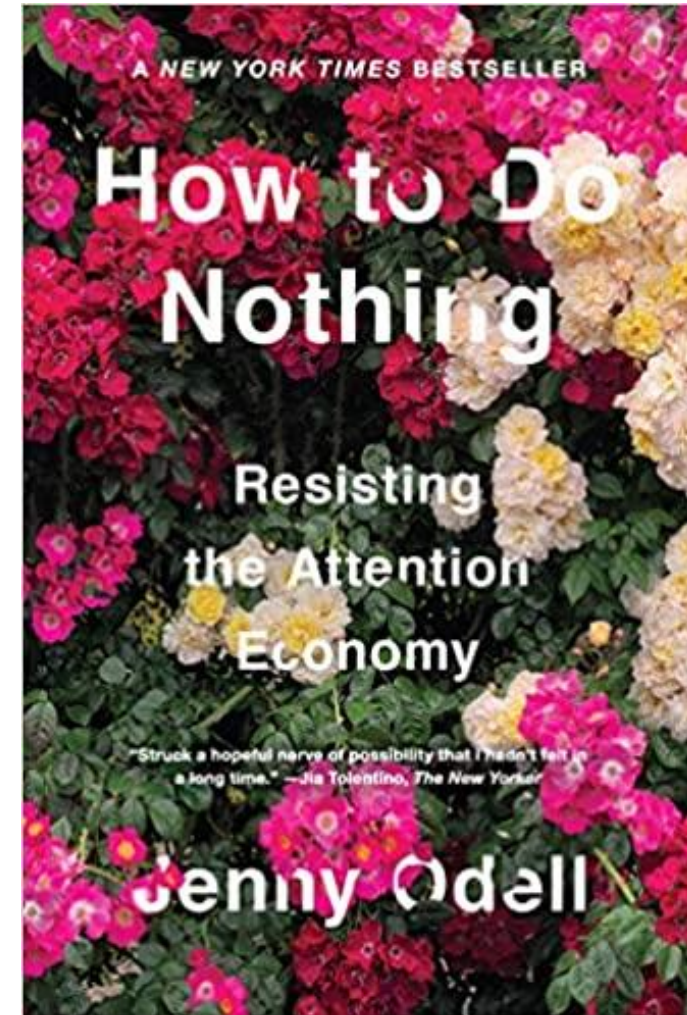
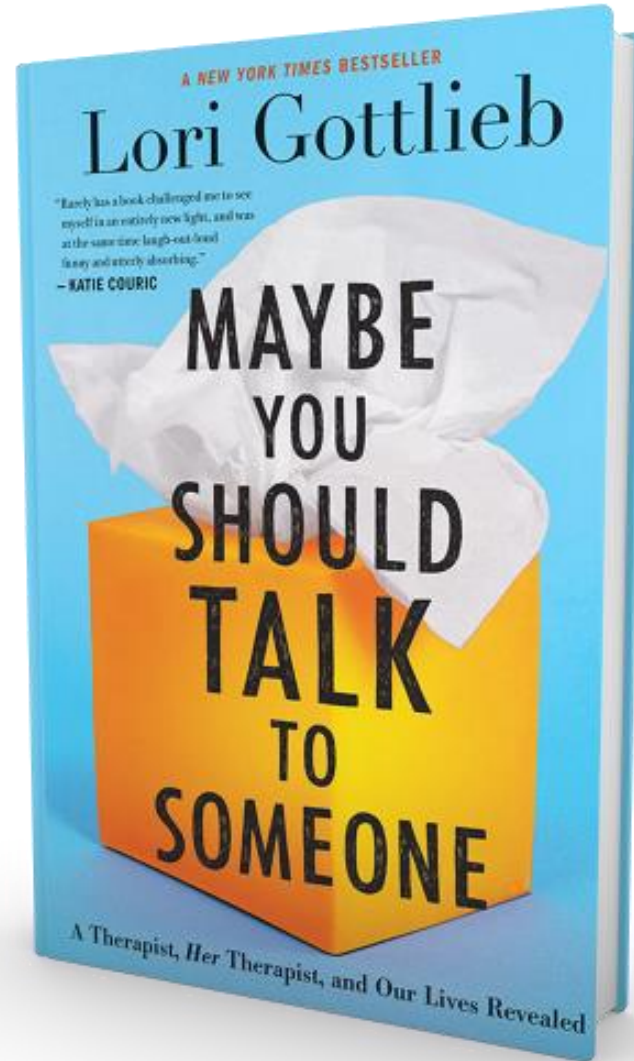
- Meta-analysis
- 5 trial, 475 participants
- Improved quality of life
- Improved VMS/physical QOL
- Insufficient evidence for reducing VMS frequency



# Acupuncture

- Inferior to HT
- Acupuncture in Menopause (AIM) study
  - N~200, at least 4 HF/day, 45-60y/o
  - 6mo acupuncture (20tx) v. wait list control
  - Acupuncture decreased VMS
    - 37% 6mo, 29% 12mo
    - (6% control)









# AROMATHERAPY

- Insufficient evidence to recommend but...
  - Safe, some evidence of efficacy, add-on
- RCT, n=100
  - Lavendar 20 min 2x/day vs. control reduced menopause symptoms (questionnaire)
- Small studies show improvement in combination with massage over massage alone



# Aromatherapy

- Systematic Review & Meta-analysis
- Lavender, neroli, mixed oils
- Menopausal symptoms & sexual desire



# Acupuncture

- Movement of Qi – vital energy/life force
- Inferior to HT
- “Sham” acupuncture / Challenges in acupuncture research
- Safe, gentle therapy
- Systematic reviews favor reduction in hot flash severity and frequency

[Cochrane Database Syst Rev.](#) 2013 Jul 30;(7)  
[Menopause.](#) 2016 Jun;23(6):626-37



# Acupuncture vs. medication

- RCT in 50 women with history of hormone (+) breast cancer on anti-hormone therapy
- 12 weeks
  - Venlafaxine 37.5mg 1wk, then 75mg daily
  - Acupuncture 2x/wk for 4wk, then 1x/wk
- Reduction in VMS frequency & severity
  - Comparable in depression & MenQOL
- Adverse effects incidences
  - Acupuncture: 0
  - Venlafaxine: 18
    - Nausea, dizziness, anxiety, dry mouth





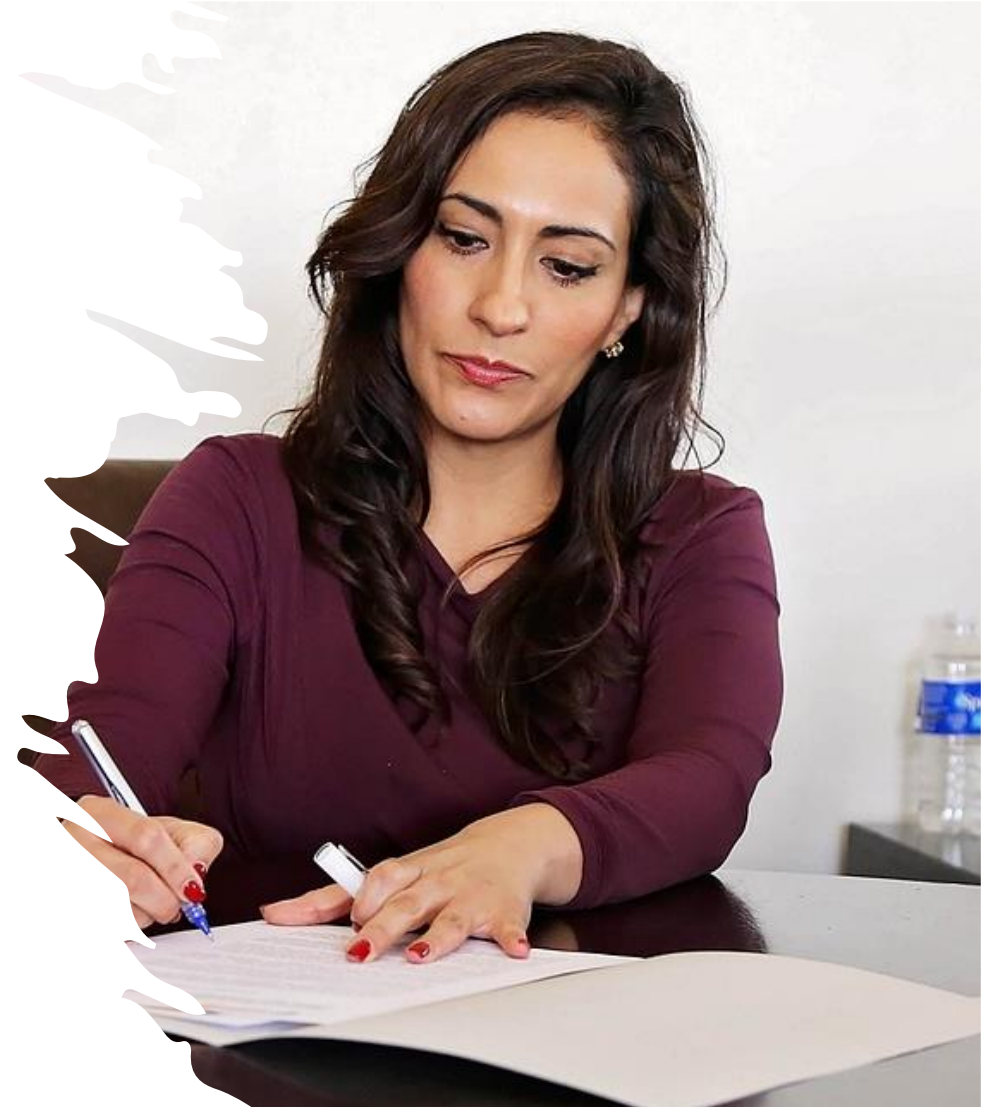
# Safety in Acupuncture

- Should not delay other treatment
- Generally safe
  - Sterile, single use needles
  - FDA regulates needles as medical devices
    - Used by certified professionals
    - Specifications for manufacturing
- Licensed acupuncturists
  - [www.nccaom.org](http://www.nccaom.org)



# Claire

- CBT
- Mindfulness
- Hypnotherapy
- Possibly acupuncture





# Takeaway

- CBT, Mindfulness & hypnotherapy are beneficial mind-body therapies in menopause
- Natural products should be reviewed for risk/benefit & might help for mood manifestations of menopause


# Women's Health Blog

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Women's Health | Shilpa Gajarawala DMSc, MPAS, PA-C and Mayo Clinic Press Editors |  
December 16, 2021

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[mcpress.mayoclinic.org/blogs/](https://mcpress.mayoclinic.org/blogs/)





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## QUESTIONS & ANSWERS

# C: Clinical Hypnosis

## NAMS POSITION STATEMENT

**TABLE 4.** *Summary levels of evidence and recommendations*

Category	Therapy	Recommend	Recommend with caution	Do not recommend
Lifestyle changes	Cooling techniques			Level V
	Avoiding triggers			Level V
	Exercise			Level I
	Yoga			Level I
	Weight loss		Level II	
Mind-body techniques	Cognitive-behavioral therapy	Level I		
	Mindfulness-based stress reduction		Level II	
	Paced respiration			Level I
	Relaxation			Level II
	Clinical hypnosis	Level I		
Dietary/supplements	S-equol derivatives of soy isoflavones		Level II	
	Supplements, herbal therapies			Level I to V
SSRIs/SNRIs	Paroxetine	Level I		
	Escitalopram	Level II		
	Citalopram	Level II		
	Venlafaxine	Level II		
	Desvenlafaxine	Level II		
Other medications	Gabapentin	Level I		
	Pregabalin	Level II		
	Clonidine	Level II		
Other therapies	Acupuncture			Level I
	Stellate ganglion block		Level II	
	Calibration of neural oscillations			Level III
	Chiropractic intervention			Level III

Abbreviations: SNRIs, serotonin-norepinephrine reuptake inhibitors; SSRIs, selective serotonin reuptake inhibitors.





**Thursday 11:00am – 12:00pm**

**CME: Integrative Healthcare in  
Menopause**

Please scan this QR code on you mobile  
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