

Feature

Introduction

The newly revealed risks of hormone replacement therapy have thousands of women and their healthcare practitioners actively seeking more information about alternative therapies for symptoms of menopause. *The Herbalist's Approach to Menopausal Symptom Management*, by Aviva Romm, midwife and President of the American Herbalist Guild, offers an excellent overview of various botanicals that have been traditionally used by women going through this phase of life. The following is a shortened version of a presentation made by Aviva this past February at the educational symposium, *The Role of Botanicals in Women's Health*, co-sponsored by the American Herbal Products Association and Rutgers University.

The Herbalist's Approach to Menopausal Symptom Management

Aviva Romm, AHG, CPM

By the year 2015 it is estimated that 50 percent of all women in America will be menopausal. Women's opinions and experience of menopause are changing. Until recent decades, menopause was a hushed topic for the 40 million American women going through menopause. Today, times have changed and women are openly looking for strategies to maintain health and minimize discomforts associated with "the change." While the perimenopause may be associated with varying degrees of discomfort from mild to severe, it is important to remember that this can be the beginning of a welcomed new phase of life for women.

Symptoms of Menopause for Which Women Commonly Seek Herbal Care

- Hot flashes, memory problems, insomnia, fatigue, heart palpitations, depression and anxiety, vaginal dryness, heavy bleeding, incontinence, and hair loss are some of the most common problems for which women seek botanical therapies during this time.
- Women also encounter new concerns about their heart and bones after menopause. Heart disease and osteoporosis raise the question of whether to use Hormone Replacement Therapy (HRT) for protection.

Herbal Strategies

Herbalists employ a number of useful botanical therapies that are mild, effective, and reliable. While some of these are backed by solid research, many are unsubstantiated by clinical trials. Therefore, the evidence for a number of botanical therapies for menopause is largely informed by historical use and confirmed by the empirical experience of those using them in clinical practice.

Symptoms

Hot Flashes and Night Sweats

- About 75 percent of American women will experience hot flashes; 15 percent of women will have severe hot flashes. This may lead to embarrassment, physical discomfort, and night waking, which can aggravate insomnia.

- Botanical therapies commonly used include *Leonurus cardiaca* (motherwort), *Salvia officinalis* (sage), *Actaea racemosa* (black cohosh), and *Panax ginseng* (Asian ginseng).

Memory Problems

- Memory difficulties may be a function of hormonal changes, and are worsened by lack of sleep and emotional stress—extremely disconcerting.

- Botanical therapies commonly used include *Ginkgo biloba* (ginkgo), *Bacopa monnieri* (bacopa), *Paeonia lactiflora* (Chinese peony), *Panax ginseng* (Asian ginseng), and *Rosmarinus officinalis* (rosemary).

Insomnia

- Insomnia is a common problem for perimenopausal women, and lack of sleep aggravates stress, memory loss, depression, and physical discomfort.
- Botanical therapies commonly used include *Scutellaria lateriflora* (skullcap), *Leonurus cardiaca* (motherwort), *Passiflora incarnata* (passionflower), *Lavandula angustifolia* (English lavender), *Piper methysticum* (kava), and *Valeriana officinalis* (valerian).

Heart Palpitations

- Heart palpitations are common amongst otherwise healthy perimenopausal women, though cardiac and thyroid problems should be ruled out.

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Depression and Anxiety

- Hormonal changes, aging, personal concerns, loss of sleep, inadequate nutrition, problems with memory, and other physical complaints can fuel feelings of frustration and depression, and new concerns about health can lead to anxiety.
- Botanical therapies commonly used include *Eleutherococcus senticosus* (eleuthero, sometimes mistakenly referred to as “Siberian ginseng”), *Ginkgo biloba* (ginkgo), *Panax ginseng* (Asian ginseng), *Angelica sinensis* (dong quai), *Leonurus cardiaca* (motherwort), *Hypericum perforatum* (St. John’s wort), and *Verbena hastata* (blue vervain).

Vaginal Dryness

- Uncomfortable, increases susceptibility to infection, negative impact on sexual experience with both physical and psycho-emotional ramifications.
- Botanical therapies commonly used include both topical emollient therapies as well as internal botanical protocol such as *Trifolium pratense* (red clover), *Glycyrrhiza glabra* (licorice), *Calendula officinalis* (calendula), *Panax quinquefolius* (American ginseng), and *Actaea racemosa* (black cohosh).

Heavy Bleeding

- Many women will experience at least one episode of vaginal flooding during the perimenopause.
- Botanical therapies commonly used include *Achillea millefolium* (yarrow), *Alchemilla xanthochlora* (lady’s mantle), *Panax notoginseng* (Tienchi ginseng), *Myrciaria dubia* (camu-camu), and *Capsella bursa-pastoris* (shepherd’s purse).

Key Materia Medica Review

A brief review of the research or potential for research on some of these herbs

Sage (*Salvia officinalis*)

Primary treatment for prevention and reduction of hot flashes; not widely researched. In one study, the efficacy of a plant product based on extracts of the leaves of *Salvia officinalis* (sage) and *Medicago sativa* (alfalfa) in the treatment of hot flashes in 30 menopausal women with these symptoms was evaluated. Hot flashes and night

sweats completely disappeared in 20 women; four women showed good improvement and the other six showed a reduction in symptoms. The plant product induced a significant increase in TSH response to TRH. Basal levels of estradiol, LH, FSH, Prl and TSH were unchanged. The product seems to have a slight antidopaminergic action without side effects and is an effective agent in the treatment of menopausal symptoms.

Red Clover (*Trifolium pratense*)

Historical use as a treatment for skin and respiratory disorders. Since the 1940s, a principle ingredient in the famous Hoxey formula. Contains isoflavones in significant quantity and exhibits competitive binding to estrogen receptors. Genestein found to be most active component of red clover and most effective of the isoflavones (which include daidzein, formononetin, biochanin A and genstein) in the plant (Li *et al.* 2001). Safety of consumption in large quantities questionable for women with breast cancer and the herb may be equivalent in estrogenic potential to estradiol; trials currently being conducted (Low Dog 2001). Isoflavones may exhibit their most notable effects in the reduction of lipids, with statistically significant reductions in low-density lipoproteins,

along with increases in high-density lipoproteins (North American Menopause Society 2000).

Asian and American Ginseng (*Panax ginseng*, *Panax quinquefolius*)

Ginseng is a highly valued medicinal plant consumed worldwide for its tonic effects. According to Mills and Bone (2000), ginseng “increases vitality and the ability to withstand stress by acting on the hypothalamus-pituitary-adrenal cortex axis; [and] restores and strengthens the body’s immune response. It is specifically used to improve learning and memory and to relieve anxiety, debility, and sexual inadequacy” (Bone 2000, Mills and Bone 2000). Further, ginseng improves exercise stamina, enhances mood, and improves hemoglobin uptake in humans (Bone 2000). Given these indications, it is reasonable that herbalists regularly use ginseng in the treatment of depression, both to treat underlying causes and symptoms, including fatigue, susceptibility to infection, sexual dysfunction, and cognitive impairment.

While ginseng has a long historical record of safe use, it has recently been shown to decrease the effectiveness of warfarin (Cupp 1999), and according to Fugh-Berman

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(2000), has led to incidence of mania in depressed patients who have combined it with antidepressant medications. Therefore, care should be taken when administering this herb with other medications.

Numerous studies have demonstrated the ability of ginseng to improve quality of life through increased stamina, mental agility, reduced susceptibility to stress and infection, and reduction of fatigue and depression (Low Dog 2000, Bone and Mills 2000, Bone 2000, Tode 1999). It may be particularly beneficial for the treatment of related menopausal complaints. A recent study shows, however, that the beneficial effects of ginseng are most likely not mediated by hormone replacement-like effects, as physiological parameters such as FSH and estradiol levels, endometrial thickness, maturity index and vaginal pH were not affected by the treatment (Tode *et al* 1999).

Chaste Tree (*Vitex agnus-castus*)

Chaste tree, or vitex, has gained in popularity in recent years for its use in regulating the menstrual cycle. It has been shown to have a dopaminergic effect, which leads to a net reduction of the hormone prolactin, a hormone which when elevated, has been associated with premenstrual mood fluctuations (Trickey 2001, Mills and Bone 2000). It is also thought to improve relative progesterone deficiency via enhancement of corpus luteal development (Mills and Bone 2000). Liu *et al.* (2001) demonstrated competitive estrogen receptor binding with chaste tree. However, the exact mechanisms of action of chaste tree are still unknown. Many women experience noticeable benefit in the reduction of both premenstrual and perimenopausal stress and depression. However, several herbalists have noted an exacerbation of symptoms, but only rarely. It has been speculated that this exacerbation may occur in women who are already estrogen deficient and progesterone dominant, the effects of adding chaste tree aggravating this imbalance. Its progestogenic effects may encourage the stabilization of the uterine lining and be useful in the prevention of perimenopausal flooding. It is considered safe for long-term use, however, use cautiously in adolescents due to potential effects on sex hormones.

Black Cohosh (*Actaea racemosa* syn. *Cimicifuga racemosa*)

Black cohosh has a long history of use as an herb for women, widely employed by Native Americans, Eclectic physicians, and folk herbalists. It has recently gained widespread attention for its treatment of perimenopausal symptoms, most originally due to alleged phytoestrogenic effects, with phytoestrogens acting weakly to bind with our endogenous estrogen receptors, thus potentially enhancing estrogen levels in women who are estrogen

deficient, and reducing excess endogenous estrogen levels by preferentially binding with these receptor sites. This action, however, is uncertain.

Black cohosh is an excellent antispasmodic, facilitating reduction of tension and elevated blood pressure, and promoting relaxation and sleep. Combined with its ability

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to reduce hot flashes, uterine spasms, and to serve as a general uterotonic, black cohosh is an excellent addition to formulae for women with menstrual or perimenopausal complaints and depression.

Side effects are not expected when used at recommended doses. Caution should be exercised during pregnancy and short-term use only may be advisable for adolescent girls.

Ashwagandha (*Withania somnifera*)

Much like ginseng, eleuthero, and licorice, ashwagandha has adaptogenic effects, supporting the adrenal axis and, with long-term use, reducing the effects of stress. Reducing the stress response can lead to a physiologic reduction of stress hormones that are indicated in depression. It is also a nerve tonic, gentle and mild sedative, and immune tonic. It improves health and stamina when there is debility and nervous exhaustion due to stress. It may be used safely for elderly and pregnant patients, and may be useful in the prevention and treatment of cancer (Bone 2000).

Dong Quai (*Angelica sinensis*) and Chinese Peony (*Paeonia lactiflora*)

In traditional Chinese medicine, a primary causative factor of depression is considered to be blood deficiency—also symptomized by pallor, fatigue, and weakness. Blood deficiency is exacerbated by the regular monthly loss of blood through menses, as well as by childbirth. Formulae for the treatment of deficient blood frequently contain the herbs dong quai (tang gui) and Chinese peony. Their actions, in addition to enhancing red blood cell production (Bone 2000), may be partly estrogenic (Trickey 2000), though Bone counters that it doesn't have any estrogen-like effects on the uterus. Dong quai and Chinese peony have both shown demonstrable effects in the treatment of dysmenorrhea, and both are anti-anemic female tonics. Dong quai is contraindicated where there is

tendency to uterine bleeding and should not be used without expert supervision during pregnancy. Chinese peony is a good general antispasmodic and muscle relaxant, may mildly enhance cognitive function, and has immune-enhancing qualities. These herbs are often combined with *Rehmannia glutinosa* (rehmannia), *Ligusticum*, and *Glycyrrhiza glabra* (licorice).

Ginkgo (*Ginkgo biloba*)

Waynberg J, Brewer S. (2000) investigated the possibility of an alternative to chemical medication in the treatment of sexual dysfunction in healthy women. The efficacy of a unique herbal formulation of *Ptychopetalum olacoides* (muira puama) and ginkgo (Herbal vX) was assessed in 202 healthy women complaining of low sex drive. Various aspects of their sex life were rated before and after 1 month of treatment. Responses to self-assessment questionnaires showed significantly higher average total scores from baseline in 65% of the sample after taking the supplement. Statistically significant improvements occurred in frequency of sexual desires, sexual intercourse, and sexual fantasies, as well as in satisfaction with sex life, intensity of sexual desires, excitement of fantasies, ability to reach orgasm, and intensity of orgasm. Reported compliance and tolerability were good. Numerous studies demonstrate the efficacy of ginkgo for treating failing memory, depression, and cognitive dysfunction. These are significant factors in the etiology of perimenopausal depression. Ginkgo does not directly act as an antidepressant herb, but through its action of improving cognitive function and enhancing memory, and increasing cerebral blood flow and tissue oxygenation, may enhance psycho emotional well being (Boniel and Dannon 2001, Mills and Bone 2000, Curtis-Prior *et al* 1999, Werbach and Murray 1994). Additionally, memory loss in perimenopausal women can itself lead to anxiety and depression, and relieving this symptom may thus improve outlook.

While ginkgo has been associated with few side effects, it has been associated with spontaneous bleeding, both in conjunction with anticoagulant herbs and independently. Therefore, ginkgo should not be used with other anticoagulant therapies, including aspirin, and its use should be discontinued several weeks before any anticipated surgical procedures (McKenna *et al* 2001, Mills and Bone 2000, Fugh-Berman 2000, Cupp 1999).

Tienchi ginseng (*Panax notoginseng*)

A recent animal study by White *et al* (2001) evaluated the effectiveness of Tienchi ginseng in reducing bleeding time. This herb is currently employed by some midwives in the United States for the treatment of postpartum hemorrhage and menopausal flooding. Tienchi ginseng showed a favorable result over placebo in reducing bleeding time.

St. John's wort (*Hypericum perforatum*)

The most popular antidepressant herb on the market, St John's wort, has a long history of use for depression, dating to the middle ages when it was used as protection from "evil spirits" – which were believed to cause abnormal mental states (Trickey 2001). The name *Hypericum* stems from the Greek word meaning "over an apparition" based on the belief that it caused evil spirits to flee (Trickey 2001, Linde and Mulrow 2000, Low Dog 1997). It is currently recommended for the treatment of mild to moderate depression. This herb has some history of use for the treatment of depression in menopausal women, and may be combined with other herbs such as *Vitex agnus-castus* (chaste tree) or *Actaea racemosa* (black cohosh syn. *Cimicifuga racemosa*) for this purpose (Trickey 2001, Mills and Bone 2000).

There is a vast amount of literature demonstrating the relative safety and efficacy of St. John's wort as a treatment for depression, yet the exact mechanisms of action are unknown. There has been investigation into what is believed to be the active principles hypericin and hyperforin, and to its possible actions as an MAO inhibitor and its ability to act upon serotonergic pathways (Bone and Mills 2001, Boniel and Dannon 2001, Gaster and Holroyd 2001, Trickey 2001, Fugh-Berman and Cott, Wong *et al* 1998, Low Dog 1997, Upton 1997, Werbach and Murray 1994). Many of these authors cite studies indicating that St John's wort has been shown to be better than placebo and at least equal to standard prescription antidepressant medications.

Few side effects are seen with St. John's wort use, however, it has been shown to

cause transient photosensitivity in fair-skinned people (Fugh-Berman and Cott 1999). This condition disappears within a few days of discontinuation of the product, and is generally, though not always, associated with higher than recommended dosages (Fugh-Berman and Cott

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1999). More recently, St. John's wort has been found to affect the expression of Cytochrome P450 and thus lead to interactions with a number of pharmaceutical drugs, most notably cyclosporine (Treasure 2000). All patient medications should be audited for possible herb-drug interactions before St. John's wort is prescribed. St. John's wort should be avoided by those taking medications with a narrow therapeutic index such as anticoagulants, immunosuppressants, and anti-arrhythmics (Treasure 2000). Patients already using prescription antidepressants should also avoid concurrent use of St. John's wort (Treasure 2000, Cupp 1999).

Kava (*Piper methysticum*)

Kava shows significant ability to reduce anxiety and promote deep relaxation and sleep (Boerner 2001, Wheatley 2001, Trickey 2001, Mills and Bone 2000, Cauffield and Forbes 1999). While not directly used for the treatment of depression, kava can reduce stress and chronic pain, thus having an indirect but definite ability to impact depression due to any of these causes. Kava was shown in one study to be of specific use in the reduction of menopausal anxiety and to "accelerate the resolution of psychological symptoms" when combined with hormonal therapy (De Leo *et al* 2001). Mechanisms of the psychotropic action are directly related to kava pyrones. It is speculated that they have the ability to block the uptake of noradrenaline. The sedative action may be related to an ability of kava pyrones to increase the number of GABA binding sites (Trickey 2001). "The official policy of the industry is that further investigation is needed to assess the true potential toxicity of kava kava. Practitioners must make a relative benefit-risk assessment regarding the prescribing or dispensing of kava kava and are further advised to pay close attention to liver specific signs that may arise, and to inform their patients of the same" (Upton 2001). Kava should not be combined with other medications until further evidence is available. Some individuals describe the experience of using kava as "unpleasant" or "numbing". Therefore, it may be advisable to give a small trial dose to rule out such individuals.

Motherwort (*Leonurus cardiaca*)

While a Medline search revealed no citations for motherwort, a western herb with a long history of use for women's menstrual and menopausal complaints that has served as a uterotonic and nervine, there is ample literature on Chinese motherwort. One article (Hu S. 1976) describes special prescriptions for internal and external uses – including pills for pregnant women, for mothers post partum, and as an emmenagogue. Western herbalists make use of motherwort to treat menopausal anxiety, insomnia, heart palpitations, and uterine atony.

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